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KIESTER-HALL SEED ANNUAL



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"BETTER SEEDS BETTER SERVICE BETTER CROPS"

KIESTER-HALL SEED COMPANY
WATERLOO IOWA

GENERAL INFORMATION

Read This Page Before Ordering

The Kiester-Hall Seed Company is a seed house with a fixed policy and a definite purpose. Our policy is to satisfy our customers by dispensing only the purest and best seeds obtainable; to work on the basis of a square deal to all concerned. Our purpose is to assist our customers and their communities in every way within our power to a greater and more profitable production from their gardens and fields. To this end we have established OUR SEED, SOIL AND CROP SERVICE BUREAU. We have established a library of more than 100 volumes covering subjects of interest to farmers and gardeners generally. We have put in an electric seed tester, a soil testing apparatus, delicate weighing machines, powerful microscopes, testing sieves, and have also on file a collection of data, the accumulation of years, covering farming subjects generally. Ask us questions. Write us. Better still, come in and see us. We are here to serve you.

These letters (K-H) before the description of any seed, plant or other article offered in this catalog means that the Kiester-Hall Seed Company recommends the article named as being especially worthy of confidence. It is our choice—our selection from among many good offerings.

Write your order, your name and your address plainly. This will avoid delay in filling your order, will insure better service and prompt shipment.

Order by catalog number. Use the name of the seed, too, if you wish to, but wherever a catalog number appears, be sure to use it in writing your order.

Make all remittances payable to KIESTER-HALL SEED COMPANY.

You can remit by Postoffice or Express Money Order,

by Bank Draft or Personal Check, but any currency included in your letter is sent at your own risk, unless by Registered Mail.

All goods listed are shipped postpaid unless otherwise specified.

No goods sent C. O. D. unless one-fourth of the amount of the order accompanies the order in cash.

Keep a copy of your order. This is the easiest way for you to check the goods when you receive them. We use the utmost care in filling orders, but everybody is liable to make a mistake occasionally—so do we—but we will cheerfully correct any error if you will write us freely and frankly about it. We will not be satisfied until you are.

Because of a host of conditions not under our control, such as extremes of temperature, improper preparation of the seed bed, planting too deep or too shallow, insect pests, improper soil, wet weather, frosts, etc., we cannot assume any responsibility after the seed leaves our possession; therefore, we give no warranty, expressed or implied, as to description, quality, productiveness or any other matter of any seeds, bulbs, or plants we send out, and we will not be in any way responsible for the crop. We test all our seed before shipping; we exercise the utmost care and do all that is humanly possible to provide seeds of high purity and germination. If there is a slip somewhere, it is not knowingly our fault.

An order sheet and a return envelope are sent out with each catalog. If more are wanted, just say the word and they will be sent to you at once.

Our Telephone Number is 1388—Waterloo.

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Address All Communications Plainly to

KIESTER-HALL SEED COMPANY

Waterloo

(400-402-404 West Park Avenue)

Iowa



SUDAN GRASS

The Greatest Forage Crop That can be Grown in Iowa! Produces Hay That is the Equal of Alfalfa. You Can Cut 2 to 3 Tons per Acre, Two to Three Times per Year. It Laughs at Drouth and Rejoices When It Rains.

In order to be successful the farmer must raise the feed for all his livestock. Money spent for feeding stuffs is a great drain upon the farm, and often marks the difference between success and failure.

Sudan grass, because of the certainty with which it produces, its rapidity of growth, the number of crops that can be harvested in a given season, its palatability and high nutritive value, makes it possible for any farmer to raise on a limited acreage sufficient feed for all his work stock. On the average fifty-acre farm, from two to five acres are advised; on larger farms, in proportion. Thus it makes stock farming an easier possibility than ever before. In augmenting the production of live stock and live stock products, it means much to the prosperity of the nation.

Sudan grass fits well into most any crop rotation or cropping system practiced in this country. Planted in the spring, it produces from two to four crops and is killed by the first freeze of winter. It makes intensive farming an easy possibility where it has hitherto not been practiced. It thus increases the possibilities of this country for a large population. It will assist in solving the problem of what to do with our immigrants, who are sure to come to the United States now that the European war is over.

As a catch crop, Sudan grass has no equal. If one fails to secure a stand of corn, cotton, oats, or other early planted crop, the land may be plowed and planted to Sudan grass, and one or two crops of hay produced on land which would otherwise go unused for the season. The possibility of failure to produce a crop a season is thus practically eliminated from the farmer's operations.

Sudan grass is indeed, a blessing to the semi-arid sections of the country. Its great drouth-resistant qualities make it possible to grow hay in those sections where hay has heretofore been scarce. It thus aids in the reclamation of millions of acres of land which were until recently

thought to be valueless for agricultural purposes.

For the same reason it adds to the value of lands in sections where drouths are of occasional occurrence. In such sections it makes it possible for a farmer to depend upon producing a crop where hitherto there has always been an element of doubt.

To sum up, Sudan grass means much to the nation, because it will augment the supply of live stock and live stock products, more horses, mules, beef cattle, sheep and goats; more milk and butter. Thus the nation's food supply will be increased, working to the advantage both of the buyer in the city and seller in the country.

If you could get three cuttings of three tons per acre of hay the equal of alfalfa, on an outlay of a few dollars an acre, would you consider it a good investment? Just what you are looking for! All right; Sudan grass will do just that. Fifteen to twenty pounds to the acre sown at corn planting time means nine tons of the finest hay you ever saw; nutritious, palatable, succulent feed. Your live stock will leave good clover, timothy or alfalfa hay for Sudan grass.

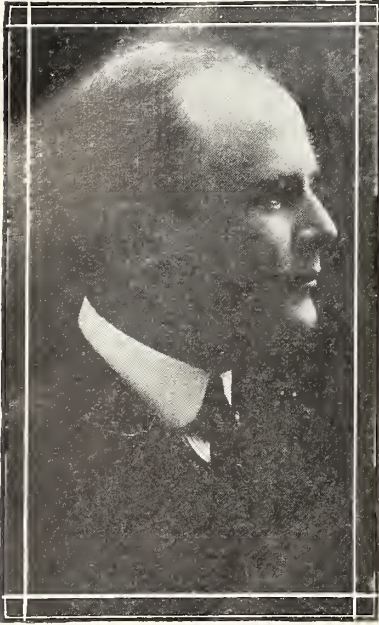
Sow broadcast or with a wheat drill, about one inch deep; cut and shock with a grain binder. Think of it; five acres



Thirty Acres of Sudan Grass 8 ft. high, on the farm of F. J. Meier, near Waterloo

of Sudan grass means thirty to forty tons of feed. Can you beat it? With alfalfa and clover hay selling at \$35 per ton, you simply cannot afford to be without Sudan grass. Quit paying prohibitive prices for hay. Top the market with Sudan grass fed steers. Make your farm yield handsome dividends. Sudan grass will make your high-priced good old Iowa

land pay big interest on your money. Place your order with us today. Get in on this greatest cash money crop you can put on your land. If you are in doubt about Sudan Grass; if there is anything you want to know about it, write us or the Agricultural College at Ames, or the U. S. Department of Agriculture. But act quickly; our supply is limited. Remember, when you buy Sudan grass seed from us, you get Iowa grown seed; no risk of getting Johnson grass—that noxious weed so common in Southern grown Sudan grass. Ask for sample and prices.



Harry E. Kiester, President

Introducing the KIESTER-HALL SEED COMPANY

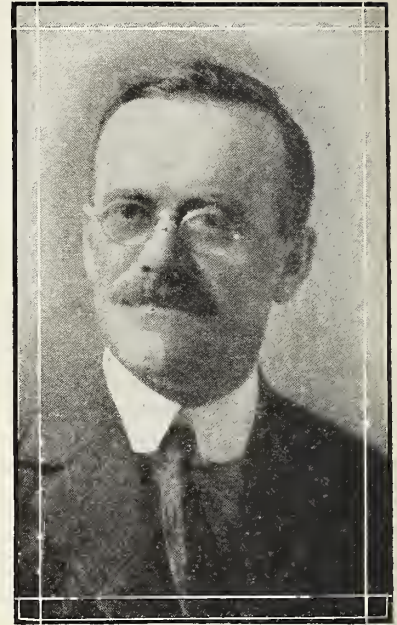
A new seed company backed by the live and progressive farmers of Northern Iowa. A seed company with a fixed policy and a definite purpose. A seed house where seeds are sold with regard to their quality, sold by men who have the necessary knowledge and experience to advise regarding their adaptability and render other valuable service of interest and value to its customers.

Every packet of seed offered by us is guaranteed to contain new seed of 1919 harvest, grown on contract by responsible growers especially for our customers. We positively guarantee our seeds to be of the highest quality; there are none better at any price.

Our prices are popular, and all packets contain a liberal quantity of high grade seed, sufficient for the average home garden. We fill all orders promptly, and cheerfully adjust mistakes if they occur.

All Seed 1919 Crop

Our new 1919 crop Iowa grown field seeds are sent out to customers with the confident assurance that they will give the utmost satisfaction. All field seeds offered are the best obtainable, the only quality we handle. Quality considered, our field seed prices are unusually reasonable, and should command a very large sale.



George Hall, Vice-President

OUR BUSINESS MANAGER. "Mr. Kiester has a nation-wide reputation as an advertising expert and promoter of publicity. He will have charge of the publicity work of the Company, arranging the advertising matter, handling the sales end of the business and general promotion work among the growers. It is safe to say when the Company gets organized, the farmer will know the whys and wherefores of proper seed, the fabric upon which is built successful crops, and where to get it. Mr. Kiester has been exceedingly successful in missionary work along the lines of production and conservation on the farm."—Waterloo Times-Tribune.

OUR SEED EXPERT. Our Vice-President and seed expert, Mr. George Hall, is recognized throughout the U. S. A. as a man with few equals as an expert agriculturist. He has behind him 35 years of international experience gained on the seed farms of Europe, Africa and America. He introduced Sudan grass into Iowa and it has proven a boon to thousands of farmers as a soiling and hay crop. He has done a lot of missionary work in getting alfalfa started in Iowa by advising farmers how to prepare their land.

Our customers who have farm or garden troubles are invited to address questions to Mr. Hall; he will consider it a pleasure to render such help as he is able. There is no charge for advice.

Our Help

Thirty years connection with various large business institutions has given us an excellent opportunity to get acquainted with the inner feelings of the average employee, hence we have decided to run our business along lines of mutual interest. Our employees are well paid, work reasonable hours, and are offered such comforts as should stimulate a feeling of co-partnership.

We have provided a comfortable rest room where our employees can take their meals in comfort and enjoy a mid-day hour of music or reading. Each afternoon at 3 o'clock all employees are invited to cease work for a few minutes, during which time light refreshments are served. This is a daily get-together meeting of employers and employees. Our aim will always be to create a feeling of mutual good will all through our seed house which will be for the good of our employees, our customers and ourselves.



Home Office and Warehouse; 400-402-404 W. Park Ave.
One block from C. G. W. and C. R. I. & P. Ry. Union Station

SERVICE THAT SERVES

Honest Values

Don't forget that we are offering only 1919 crop seeds of proved reliability at fair prices. We put into every packet of seed we send out the fullest possible value for money received. Our seeds are grown on contract for us by the same reliable growers that contract for the big Eastern seed houses, but they cost you less. We can sell them to you for less because we do not conduct huge advertising campaigns or have to contend with the enormous overhead of our bigger brothers down East.

Policy: Purpose

It is the policy of our house to give every customer the greatest value possible for the money, to handle only high quality seed and to conduct all our business on the basis of a square deal. It is our purpose to assist our customers, to the extent of our ability, that they may realize the greatest possible production from their fields and gardens. We have adopted as a trade slogan: Better Seeds; Better Service; Better Crops. We will not be satisfied until you are.

Kiester-Hall Seed Co., Waterloo, Iowa.

Gentlemen: The seed Rye arrived last week, 20 bags in good order. I thank you for getting the seed to me so promptly.

Respectfully,

JOHN L. HAUSER.

Cedar Falls, Iowa, September 3d, 1919.

Order Early and Avoid the Rush

March and April is the rush season in the seed business, and during these months it is a matter of impossibility to get out all orders promptly. We therefore advise our customers, if conveniently possible, to let us have their orders during January and February, as this will enable us to get them out promptly and save delay or disappointment.

Kiester-Hall Seed Company, Waterloo, Iowa

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Vegetable Seed Department

Remember all vegetable seeds offered in this book were grown for us during the season of 1919. They are of high purity and germination—all fresh seeds.

ASPARAGUS—And Some Timely Suggestions for Asparagus Growers

To insure quick germination of Asparagus seed, soak the seed in luke warm water for twelve hours before sowing. Sow Asparagus seed thinly to insure nice, thrifty plants. Soil that will produce Corn will grow Asparagus. The seed germinates slowly; a good plan is to sow a few radish seeds in the row as markers so the Asparagus will not be damaged during its earliest growth. Radish seed grows quickly and will show the lines making cultivation of the Asparagus safe. Asparagus should always be transplanted in the spring or early summer. Fall transplanting is usually fatal to many of the plants. June is a good month for setting our Asparagus plants.

Columbian Mammoth White Asparagus

Gives immense yield of clear, white roots. A most distinct and valuable variety. The shoots remain white, without earthing or artificial blanching, as long as fit to use.

10A—Pkt. 5 cts.

Conover's Colossal Asparagus

A standard sort, Color deep green quality first-class, spreads less than other varieties. Yields from 15 to 30 sprouts from a single plant.

11A—Pkt. 5 cts.

Palmetto Asparagus

Mammoth in size, light green, regular in growth and appearance. Usually ready for market before other varieties.

12A—Pkt. 5 cts.



Columbia Mammoth White Asparagus—10A

Asparagus Roots (2 years old)

We have a considerable acreage of exceptionally fine two-year-old Asparagus Roots of the varieties mentioned under the heading of Asparagus seed. We strongly recommend raising Asparagus from the roots, especially the two-year-old, as when this is done, some very fine sticks of Asparagus can be gathered the following season.

13A—Price, post-paid, 25 for 60 cts.; 100, by express for 85 cts.; 1,000, by express, for \$6.00.

Home gardeners are often in doubt as to just how many Asparagus Roots they should plant in order to have a sufficient supply for the home table. 100 good two-year-old roots, properly planted, will insure enough Asparagus throughout the growing season for the average home.

A WORD ABOUT OUR VEGETABLE AND FLOWER SEED OFFERINGS—Although we have quite an extensive list of vegetable and flower seeds offered, we have purposely omitted many varieties we might have offered. Thirty-five years spent almost entirely in the garden has enabled us to make a selection of both vegetable and

flower seeds that we know to be positively the best in their line. If planted and cared for properly, there is not a packet of seed offered by us that will not give entire satisfaction; they have been selected for quality, reliability and productivity.

BEANS

SOME BEAN PROBLEMS AND A FEW SUGGESTIONS—Don't plant beans until the soil is warm and all danger of frost is past. Beans thrive best in a good sandy, loam soil. A good fertilizer for Beans is one containing a fair percentage of Phosphate, the pod-making fertilizer. Soil, too rich in nitrogen, will produce fine plants but few beans. Keep out of the Bean patch while the plants are wet with dew or rain. Anthracnose and other diseases are often spread by working in the Beans while the foliage is wet. Keep Beans picked off as soon as they are ready; this will prolong the producing season. When Beans are affected with Anthracnose (Spotted Disease) spray with Bordeaux Mixture. Badly affected plants should be pulled up and destroyed; burn them if possible.

INOCULATE BEANS WITH "NITRAGIN" BEFORE PLANTING—It is well known to students of horticulture that strong, healthy plants, like strong, healthy persons, are much less likely to contract disease than weakly plants or persons. Beans are subject to many diseases from which they need to be protected. Insure good, strong, healthy plants by inoculating at planting time with "NITRAGIN." Include "NITRAGIN" in your order for Beans.



Pencil Pod Black Wax Bean

A Dwarf bean. The best of the black seeded wax varieties. See 20 A on Page 3.



Detroit Golden Wax Bean

For Description see 22A—Page 6

BEANS—Dwarf or Bush Varieties of Wax Beans (Continued)



K-H Improved Golden Wax Beans. 23A

DWARF BEANS

Green Podded Varieties

BOUNTIFUL—Best of the flat-podded stringless varieties. Pods $6\frac{1}{2}$ to 7 inches long, stout, flat and slightly curved; stringless, slightly fibrous, attractive and of fine quality; color light green. Very early, vigorous, hardy and productive.

27A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.

FORDHOOK FAVORITE—A new, white-seeded, high quality bean. Pods are $5\frac{1}{2}$ to 6 inches long, straight, almost round, thick and meaty and showing marked depressions around the beans; strictly stringless and medium green in color; medium early and productive.

28A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 50 cts.

STRINGLESS GREEN POD—The finest green pod, stringless bean. The earliest and hardest of all green-podded sorts and produces large, handsome pods, some of which measure fully 6 inches in length. The plants are productive, bearing profusely the beautiful green pods, which are perfectly straight, round, broad, tender, brittle, of finest flavor, very fleshy and entirely stringless.

29A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.

LONG YELLOW SIX WEEKS—An old standard variety, very vigorous, hardy, productive and early. Pods 5 to 6 inches long, flat, light green in color, with more or less string, and of good quality.

30A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.

EXTRA EARLY RED VALENTINE—Pods are usually ready to pick in about forty days from germination. Vine erect; pods medium length, curved, cylindrical, with crease in back, very fleshy, crisp and tender; seed long, of medium size.

31A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.

TENNESSEE GREEN POD (Brown Bunch)—A very popular bean. Plant vigorous, hardy, mid-season and very productive. Pods are extremely large, 6 to 7 inches long, very flat, irregular in shape, dark green in color and of exceptionally fine flavor, and nearly stringless. Beans chocolate brown. 32A—Pkt. 10 cts.; 1 lb. 65 cts.

BEANS—(Pole or Climbing Varieties)

KENTUCKY WONDER (Old Homestead)—This climbing variety is very vigorous and productive and bears its pods in large clusters. The pods are being 9 to 10 inches, nearly round, stringless and that they are greater in width than breadth. The seed is one of the very best early Pole Snap beans for the home garden or market.

33A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 50 cts.

GOLDEN CLUSTER WAX—An excellent Pole wax-podded sort; early, vigorous, hardy and productive. Pods $6\frac{1}{2}$ to 7 inches long, extremely straight and flat; very fleshy, fine-grained, attractive and of good quality; color light waxy-yellow. Beans, white, oval-shaped.

34A—Pkt. 10 cts.; $\frac{1}{4}$ lb. 16 cts.; 1 lb. 50 cts.

PENCIL POD BLACK WAX BEAN—The best of the dwarf, black-seeded, wax varieties. Early and very productive. Pods large, $6\frac{1}{2}$ to 7 inches long, round, straight and crease-backed; strictly stringless, free from fibre, fleshy and brittle; of highest quality; color very clear yellow. Plant growth exceptionally strong and vigorous.

20A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 45 cts.

DAVIS' WHITE KIDNEY WAX BEAN—An early, productive and attractive wax variety. Pods large and flat, $6\frac{1}{2}$ to 7 inches long, very uniform and extremely straight, stringy and fibrous and fair quality. Color clear bright yellow. Seed white and kidney shaped. A market gardener's sort.

21A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 45 cts.

DETROIT GOLDEN WAX BEAN—A Golden Wax bean of great merit; one of the earliest and best varieties for the home garden; pods about $4\frac{1}{2}$ to 5 inches long and almost straight; a prolific yielder; a good bean for northern climate.

22A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 45 cts.

K-H IMPROVED GOLDEN WAX BEAN—Probably the most popular of the wax varieties and one of the best. Very early and quite productive; pods 4 to $4\frac{1}{2}$ inches long, very stout, straight or slightly curved and oval in form; flesh brittle, stringless and of good quality; color bright yellow; seed white, much mottled brown.

23A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 50 cts.

WARDWELL'S KIDNEY WAX BEAN—A very popular, early, gardener's variety. Pods large, $5\frac{1}{2}$ to 6 inches long; moderately stout, straight and flat, fleshy, brittle, fine grained and nearly stringless. Of good quality and very attractive. See illustration.

24A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 45 cts.

KIDNEY WAX (Burpee's New)—Resembles Wardwell's Kidney Wax, but pod is longer and thicker, though not so broad; fairly productive and of high quality; stringless, fiberless, very fleshy and brittle. Pods about 6 inches long and of an attractive clear yellow color; mid-season.

25A—Pkt. 10 cts.; $\frac{1}{4}$ lb. 16 cts.; 1 lb. 55 cts.

ROUND POD KIDNEY WAX (Brittle Wax)—An excellent early, round podded, stringless variety of highest quality. Pods 5 to 6 inches long and of a light yellow wax-like color.

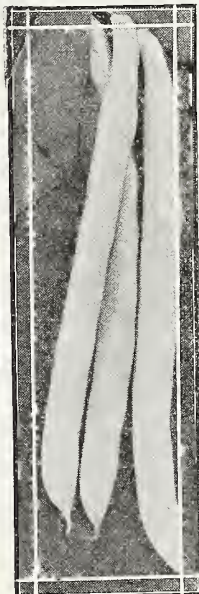
Seed white with brownish-black eye.

26A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.

Inoculate Beans with "Nitragin."—It always pays to inoculate beans with "Nitragin" before planting as it insures strong, healthy plants and an increased production. Price per can, with full instructions for using, 30 cts. (Also see page 37.)



Wardwell's
Kidney
Wax Bean



Burpee's New
Kidney Wax Bean



Stringless Green Pod Dwarf. 29A

BEANS—Pole or Climbing Varieties (Continued from page three)

KENTUCKY WONDER WAX—One of the earliest of the pole wax beans. Pods 8 to 9 inches long, thick, decidedly creasebacked, very fleshy, brittle but stringy, attractive, fair quality; color light yellow.
35A—Pkt. 10 cts.; ¼ lb. 20 cts.; 1 lb. 60 cts.

LAZY WIFE—So named on account of the large number of pods it affords, making it easy to obtain a supply. One of the best varieties for snaps of the late green-podded pole beans. The pods grow in large clusters, are 5 to 7 inches long, broad, thick, fleshy, and entirely stringless. They have a rich, buttery flavor.
36A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 45 cts.

Lima Beans—Bush and Pole Varieties

K-H BURPEE IMPROVED BUSH LIMA—This bean produces magnificent crops of pods, which measure from 5 to 6 inches long by 1½ inches wide. As compared with the original Burpee Bush Lima, both pods and beans are very much larger, while the beans, either green or dry, are nearly twice as thick. The beans have the same luscious flavor as the best flavored Limas and are ready to use six to eight days earlier. It will outyield the Burpee Bush Lima by fully one-third, this greater yield being due to the increased size of pod and beans. The dried beans are very handsome and generally show a greenish-white coloring.
40A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

FORDHOOK BUSH LIMA—There are from three to five beans in each pod, with an average of four. The beans are round and thick, like those of Dreer's Bush, and have the same mild, delicious flavor.
43A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 45 cts.

K-H KING OF THE GARDEN CLIMBING LIMA—One of the best and most popular main crop varieties. It is medium early and has very long pods, 5½ to 6½ inches long with five good-sized beans. The pods are very straight and handsome, and the fine, hardy vines bear abundantly.
44A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

LARGE WHITE POLE LIMA—The standard pole Lima. Vigorous, mid-season, productive. Pods 4 to 5 inches long, very flat, three to four seeded.
45A—Pkt. 5 cts.; ¼ lb. 12 cts.; 1 lb. 45 cts.

K-H HENDERSON'S BUSH LIMA—The earliest variety we have, being fully two weeks earlier than any other variety. Plant about 16 inches high and very prolific. Beans are small and are used for canning. Especially recommended for planting in the North and where the season is short.
41A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

DREER'S BUSH LIMA or KUMERLE—A very prolific variety, a little later than Burpee's and having short, thick pods, closely filled with short, almost round seed. The plant does not grow upright, but spreads on trails over the ground about three feet in diameter.
42A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 45 cts.



Burpee's Bush Lima Bean.

which are well filled with four or five good-sized beans. The pods are very straight and handsome, and the fine, hardy vines bear abundantly.



Fordhook Bush Lima Bean. 43A

BEETS And How to Grow Them

Beets thrive best in a good rich sandy loam. They never do well when crowded; plant four to six inches apart in the row; room between the rows for cultivation; 18 to 24 inches is about the right distance. If beets are wanted extra early, they should be sown in hotbeds and transplanted; take off all outer leaves when transplanting. For winter use, sow a few rows of the turnip variety during June or July. These will make fine beets for storing in the cellar or pit. To insure beets retaining their firmness during storage, they should be imbedded in sand. To hasten the development of beets, fertilizer should be applied between the rows two or three times during the growing season; fertilizer in liquid form is best; beets do not develop woodiness when well fertilized. A good commercial fertilizer for beets is one containing from 8 to 10 per cent Acid Phosphate.

CRIMSON GLOBE—A very handsome beet. Globe-shaped, very smooth and free from rootlets. Of medium size, with dark leaves on slender stems. Flesh exquisitely tender; color deep crimson, ringed in a most beautiful way.
50A—Pkt. 5 cts.; 1 oz. 10 cts.

HALF LONG BLOOD—Excellent second early and a good keeper. Roots deep red, half long and smooth, distinctly zoned.
52A—Pkt. 5 cts.; 1 oz. 10 cts.

CROSBY'S EGYPTIAN, Selected—For an early crop the value of this handsome beet is generally recognized; the roots running very uniform in size and shape; color a rich red; very sweet.
53A—Pkt. 5 cts.; 1 oz. 10 cts.

DETROIT DARK RED TURNIP BEET—A superior variety for medium and late planting. Top small, upright growing; color of skin, dark blood-red; flesh deep crimson; tender and very sweet.
51A—Pkt. 5 cts.; 1 oz. 10 cts.

SWISS CHARD—This type of beet is grown exclusively for its foliage. The midribs are silvery-white, thick and succulent and are cooked and served like Asparagus. The young leaves are dressed and boiled like Spinach.
54A—Pkt. 5 cts.; 1 oz. 10 cts.



Detroit Dark Red Turnip Beet. 51A

Mangel Wurzzels or Stock Beets A Winter Substitute for Summer Pasture for Dairy Cows

MAMMOTH LONG RED (The Old Favorite)—There is no other root crop grown which produces so large an amount per acre of desirable cattle food for winter use as the Mammoth Long Red Mangel. Under high cultivation, over 2000 bushels (50 tons) per acre have been grown. Our strain of Mammoth Long Red is exceptionally fine and expressly grown for us from selected, well-shaped roots. Has a distinct appearance; roots are massive, straight and regular in size, broad shouldered, small top, free from coarseness and of most excellent feeding and keeping qualities.
58A—1 lb. 50 cts.; 6 lbs. \$2.75. (Sufficient for one acre.)

GOLDEN FLESHED TANKARD (Record Milk Producer)—Roots large, ovoid, but filled out at top and bottom, terminating with a small tap root; flesh, deep golden yellow, solid, crisp, sweet and rich; excels all others in milk-producing qualities, and is very productive. It has no superior as a keeper. We have known Mangels of this variety to be kept sound and crisp, and in full flavor until June.
59A—1 lb. 50 cts.; 6 lbs. \$2.75. (Sufficient for one acre.)

GIANT DANISH SLUDSTRUP (Very High in Food Value)—The Danish Government encourages the growing of root crops by offering certificates of merit to growers who select and produce sorts which are of distinctive value. Sludstrup is considered the best of all Mangels, having been awarded first class certificate. In color it is reddish-yellow and of a distinct type. It contains the largest per cent of nutriment found in any sort. It is very hardy, grows well above ground and is easily pulled.
60A—1 lb. 50 cts.; 6 lbs. \$2.75. (Sufficient for one acre.)



59A-Golden Flesh Tankard

BEETS (Continued) — Mangel-Wurzels

GIANT FEEDING SUGAR BEET (Half Sugar White Mangel)—This magnificent Sugar Beet, while giving nearly as large a yield of easily grown and harvested roots as a crop of Mangels, supplies a food of very much higher nutritive value, the roots for feeding purposes being really more valuable pound for pound than those of the very best strains of Sugar Beet; and the yield, under equally favorable conditions, is more than double. The roots grow partly out of the ground and because of this and their shape, the crop can be harvested and stored at less expense than any other root crop. Every farmer should try it. 61A-1 lb. 65c.; 6 lbs. (sufficient for one acre) \$3.25.

Prof. Hugh G. Van Pelt, Managing Editor of Kimball's Dairy Farmer, a high authority on Dairying, referring to the Mangel-Wurzel Beets listed here and on page four says: "We are rapidly learning that regardless of what else we may feed our cows in the winter time, roots such as a mangel-wurzels, fed in addition as a tonic, furnish much food nutriment, with the result that our cows will produce much better if we thoughtfully and wisely raise mangel-wurzels in the summer time, store them judiciously and feed them during the winter when the cows have no other succulent foods except their corn silage. The wise dairyman who would profit most largely is the one who raises these feeds which I know beyond peradventure aid so certainly in enlarging and rendering persistent the milk flow of cows."



Mammoth Long Red Mangel. 58A

CABBAGES—And How to Raise Them

Good Cabbage cannot be raised from poor seed. We offer only seed raised from parent plants especially selected for their trueness to type and high-yielding quality. Our seed should produce plants alike, right through the rows and all maturing together. Cabbage succeeds best in rich, deep, mellow soil. A good supply of manure and high cultivation are necessary to insure good solid heads. If possible, early cabbage should be planted on richer soil than the late varieties. Chicken manure is an excellent fertilizer for early cabbage; it should be applied around the hills when the plants are about half grown; it will hasten the development of the plants; make the heads firmer and development early. Sow early cabbage seed during February in greenhouse or hotbed; they will usually be ready for transplanting to the open ground by April. Late cabbage seed should be sown in the open ground about the middle of April and transplanted as soon as the plants are ready. Cabbage can always be improved by an application of commercial fertilizer with an analysis of 4 to 6 per cent Ammonia and 8 to 10 per cent Acid Phosphate.

Read what Prof. Van Pelt says above about Mangel Wurzel for stock feeding.

Brussels Sprouts

(Miniature Cabbage)—A species of cabbage family which produces miniature heads from the sides of the stalk. These heads are a great delicacy, boiled in the same way as Cauliflower. The seeds should be sown about the middle of May in a seed bed, and the plants afterward set in rows two feet or more apart, and cultivated like cabbage. 68A-Pkt. 5c.

Cabbages—The Early Varieties

ALL SEASON CABBAGE—A very early variety with large deep heads and excellent quality. Equally good as early or fall cabbage. 70A-Pkt. 5c.; oz. 20c.; ¼ lb. 70c.

EARLY JERSEY WAKEFIELD—One of the best and most popular varieties. Forms round, pointed heads of good size, is very hardy and on account of its thick outside leaves is able to resist cold and other unfavorable conditions to a great extent. 71A-Pkt. 5c.; 1 oz. 25c.; ¼ lb. 90c.

DANISH SUMMER BALLHEAD—The Danish Summer Ballhead cabbage follows early varieties, producing much larger heads of light green; hard and solid, interior leaves the purest white; of sweet flavor and crisp, tender texture. Long keeping. Resembles the Winter Danish Ballhead quite closely. On light soil, it does particularly well, being a sure header. It has a compactness of growth which permits close planting. Its large round heads are less attacked by worms, bugs and diseases; being extremely hardy it does well under adverse conditions. Our stock of this superb strain is grown in Denmark. 74A-Pkt. 5c.; oz. 2½c.; ¼ lb. 90c.

LARGE EARLY CHARLESTON WAKEFIELD—Is very similar to Early Jersey Wakefield, but nearly a third larger and a little later. 75A-Pkt. 5c.; oz. 2½c.; ¼ lb. 70c.

HENDERSON'S EARLY SUMMER—A desirable, medium sized, early flat-headed variety. A good keeper and does well in summer and autumn. 76A-Pkt. 5c.; oz. 20c. ¼ lb. 70c.

Put Cabbage on New Ground

Cabbage growers who had trouble with plant diseases last season would do well to plant this year's crop on entirely different ground. The most serious diseases that attack cabbage are black-leg, black-rot, club-root and cabbage yellows, and in every case the soil becomes infected and transmits the disease to the succeeding year's crop. In the case of cabbage yellows, the disease will remain alive in the soil for twelve years after a crop of cabbage was last grown on it. In selecting seed or plants for a cabbage crop, make certain that neither are infected. The seed may be treated with a solution of corrosive sublimate, one part to one thousand parts of water, the seed being soaked in this solution for twenty minutes. It is also desirable to choose the resistant strains to avoid cabbage yellows, several such strains having been developed, notably the Hollander variety.

ALL HEAD EARLY—Probably the earliest of the large, flat-headed varieties. Is good for summer, autumn and winter crop. Desirable for all sorts of planting.

72A-Pkt. 5c.; oz. 20c.; ¼ lb. 70c.

EARLY DWARF FLAT DUTCH—A good flat-headed variety, with a short stem and hard, firm head. Forms head early; is valuable for summer. 73A-Pkt. 5c.; oz. 20c.; ¼ lb. 70c.



75A-Large Early Wakefield (Charleston)

K-H COPENHAGEN MARKET—A new early variety, which will be very popular with market gardeners. It is the finest large, round-headed, early cabbage in cultivation. It is further desirable on account of the remarkable characteristic of maturing the heads all at the same time, enabling the grower to gather the crop with less expense and permitting the cleaning of the land at the first cutting. The heads average about ten pounds each in weight, are hard and solid with small core. The quality is extra fine and sweet. It matures as early as the Wakefields and will yield more to the acre in weight. It is a short stemmed variety, the heads nearly resting on the ground. The leaves are light green, rather small, saucer-shaped and tightly folded, making it possible to set them close together in the field. 77A-Pkt. 5c.; oz. 25c.; ¼ lb. 90c.

K-H CABBAGE CROWDER

A special fertilizer prepared especially for the quick development of cabbage. Its use insures strong, healthy plants with well formed, solid heads. Price, 5 lbs., 60c.; 10 lbs., \$1. See page 38.

Brussels Sprouts. 68A
Miniature Cabbage

CABBAGES—Popular Varieties (Continued from page five)



K-H Danish Ballhead Or Hollander

Heads hard, solid, tender and crisp. The leading late sort. Danish Ballhead is more extensively grown than any other late variety, and commands a higher price on the market. It is remarkable for the solidity of its heads and long-keeping qualities. The heads are of medium size, measuring from eight to ten inches in diameter, with few outer leaves, admitting of close planting; exceedingly fine-grained, hardiest of all; tender, crisp, solid, with no waste heart. Under fair conditions will average six pounds per head.

78A—Pkt. 5 cts.; oz. 25 cts.; $\frac{1}{4}$ lb. 90 cts.

RED ROCK—The largest and surest heading red cabbage; more deeply colored at the heart than Red Dutch; medium to long stem. 79A—Pkt. 5 cts.; oz. 25 cts.; $\frac{1}{4}$ lb. 90 cts.

K-H PREMIUM LATE FLAT DUTCH—A justly popular and esteemed variety; extensively cultivated for market and family use. Heads large, round, flattened and very firm; has a medium stem and is very hardy.

80A—Pkt. 5 cts.; oz. 20 cts.; $\frac{1}{4}$ lb. 70 cts.

CHINESE or PE-TSAI (Celery Cabbage)—This is often called Celery Cabbage on the market, and when well grown, resembles Cos lettuce. It grows rapidly and matures heads in less time than other varieties. It can be sown much later than other varieties and requires no transplanting. The leaves, when young, are crimped and of a light green color. The plant, as it becomes older, grows more upright and forms heads much like Cos lettuce. The inner leaves blanch to an attractive light yellow or creamy white with very white midribs. It has a distinctive flavor, very mild and pleasant. It can be served as a salad like lettuce, or cooked like other cabbages. Chinese cabbage should be sown in this latitude at the same time as Turnips, after the first of July. Early plantings run quickly to seed in hot weather. Sow in drills 14 to 20 inches apart, and thin the seedlings two or three times; or, if grown for the market, start in boxes and transplant like late cabbage.

83A—Pkt. 5 cts.; oz. 20 cts.



Celery Cabbage.
83A

SUCCESSION—One of the best of cabbages; heads very large and somewhat flat; ten days later than Early Summer.

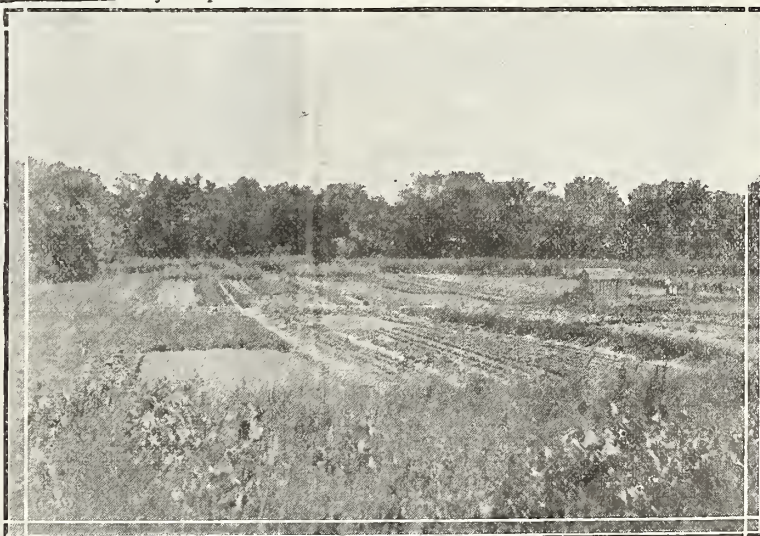
81A—Pkt. 5 cts.; oz. 20 cts.; $\frac{1}{4}$ lbs. 70 cts.

SUREHEAD—All head and always sure to head. This is an exceptionally fine late cabbage of the Flat Dutch type, but with the outer leaves of more upright growth. Heads are large, round and flattened, very hard and fine-grained; splendid keeper.

82A—Pkt. 5 cts.; oz. 20 cts.; $\frac{1}{4}$ lb. 70 cts.

COMPANION CROPS

Crops which may be planted together in the same space and occupy the same ground together are known as companion crops. Between the rows of early Cabbage may be planted Lettuce or Radishes. In the row with Onions, Parsnips or Carrots, Radishes may be sown thinly. Lettuce may be sown between Tomato plants. Radishes in rows between String Beans. Squash may be planted among early Sweet Corn. Onion sets may be planted between the early Cabbages. Radishes, early Beets, early Carrots, early Turnips and bunch Onions, may be planted between Peas. Pole Beans may be planted with early Corn. Early Potatoes may be planted between Melon rows.

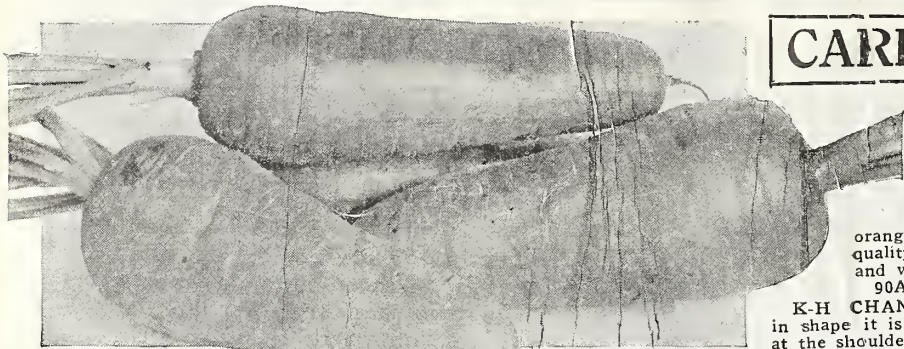


An Ideal Garden. Amana Colony, Iowa

AVERAGE TIME REQUIRED FOR SEEDS TO SPROUT

Days		Days	
Bean	5-10	Lettuce	6-8
Beet	7-10	Onion	7-10
Cabbage	5-10	Pea	6-10
Carrot	12-18	Parsnip	10-20
Cauliflower	5-10	Pepper	9-14
Celery	10-20	Radish	3-6
Cucumber	6-10	Tomato	6-12
Corn	5-8	Turnip	4-8

Plant radishes with slow growing vegetables to mark the rows for cultivation.



Improved Danvers
Half Long. 92A

IMPROVED DANVERS HALF LONG—A very beautiful carrot. A first-class carrot for all soils. In form midway between the Long Orange and the Short Horn. The root is of a rich, dark orange color and grows very smooth and handsome; 20 to 30 tons per acre not being an unusual crop.

92A—Pkt. 5 cts.; oz. 10 cts.

of the finest quality. It is medium early, and we cannot recommend it too highly.

HALF LONG SCARLET NANTES (Stump Rooted)—Tops of medium size; roots cylindrical, smooth, bright orange; flesh becoming yellow in center, but with no distinct core. Of the finest quality, and one of the most symmetrical and handsome of the medium sized carrots; excellent for the market or home garden.

93A—Pkt. 5 cts.; oz. 10 cts.

CELERY Celery needs very rich soil and plenty of water; if the soil is not rich, supply the plants with plenty of liquid fertilizer. Sow the seed in shallow boxes indoors during February or March, or in a well-prepared seed bed outdoors the end of April or early in May. Celery seed should be covered only very lightly with soil, and the soil should be kept thoroughly moist until the seed has germinated. The seed is very slow germinating, usually taking from ten to twenty days. When the plants are large enough, transplant them so that they stand two inches apart each way. When four inches high, cut off the tops, trim the roots, and plant out in the open ground where they are intended to make plants. A good fertilizer for Celery is one with an analysis of 8 to 10 per cent Acid Phosphate and 4 to 6 per cent Ammonia.

K-H PARIS GOLDEN SELF-BLANCHING—Plants of a yellowish green color when young, but as they mature the inner stems and leaves turn a beautiful golden yellow, which adds much to their attractiveness and makes the work of blanching much easier. The handsome color, crispness, tenderness, freedom from stringiness, and fine nutty flavor make it only necessary to be tried in order to establish it as a standard of excellence as an early sort. Paris Golden is rapidly becoming a leading favorite of gardeners.

100A—Pkt. 5 cts.; oz. 60 cts.

GIANT PASCAL—For the market gardener this is the most profitable celery for fall or winter use. This is a green-leaved variety, developed from the Paris Golden; it is somewhat larger and taller and its fine nutty flavor is free from any bitter taste. It grows about two feet high, and the stalks are broad, thick and crisp, blanching with but slight earthing-up very quickly.

102A—Pkt. 5 cts.; oz. 45 cts.

K-H WINTER QUEEN—It is one of the very best late varieties; strong grower, thick ribbed. Blanches a beautiful creamy white. Ribs are solid, crisp, and have a delicious nutty flavor.

103A—Pkt. 5 cts.; oz. 45 cts.

CELERY (Turnip Rooted)

LARGE EARLY ERFURT (Celeriac)—Roots of large size, rounded and clean-skinned, with a small neck.

104A—Pkt. 5 cts.; oz. 20 cts.

CELERY (Turnip Rooted)

LARGE SMOOTH PRAGUE—One of the largest; smooth and almost spherical.

105A—Pkt. 5 cts.; oz. 20 cts.

WATER CRESS Native of Europe. A perennial. This is an aquatic plant, with long stems which readily take root in moist soil or water. It is esteemed for use as a salad on account of its pleasant pungent flavor. Leaves are compound, with roundish divisions; flowers small white, in terminal spikes; seeds, usually few, very fine, in slightly curved pods. It can only be cultivated successfully in moist situations and generally does best along the edges of streams, where it grows partially in the water. It may, however, be grown successfully in any moist soil, even in a greenhouse. It is very hardy, but for best results should be covered with water during winter. Most of the supply for our markets comes from along the courses of natural streams. In Europe, trenches from 16 to 20 feet wide for growing Water Cress are often excavated, into which running water may be turned at pleasure. In the bottom of these trenches the roots of the Cress are planted. The water is then let in, and the plants are not interfered with until they have grown strong enough to yield a crop of leaves. It is often practicable to make narrow beds for this purpose about springs or slow running streams.

CARROTS

Popular Garden Varieties

GUERANDE or OXHEART—This fine and very popular Carrot is intermediate as to length, between half long varieties such as Danvers, and the Scarlet Horn; but much thicker than the latter, being at the top from four to five inches in diameter. Flesh bright orange, fine-grained and sweet. It is of very fine quality for table use. A heavy and profitable cropper, and we cannot recommend it too highly.

90A—Pkt. 5 cts.; oz. 10 cts.

K-H CHANTENAY—As a table variety it is first-class; in shape it is larger than the Scarlet Horn, and also broader at the shoulder. Flesh is of a beautiful, rich orange color and is of medium early, with small tops. Roots taper slightly, but

91A—Pkt. 5 cts.; oz. 20 cts.

IMPROVED LONG ORANGE—A standard late variety of great merit, very handsome and uniform in shape, roots are a rich deep orange color, good flavor, and yields very heavily. Sow in a deep soil, thinning to six inches apart in eighteen-inch drills for roots to attain their full size.

94A—Pkt. 5 cts.; oz. 10 cts.

K-H EARLY SCARLET SHORT HORN—One of the most popular varieties grown. Color, deep orange; flesh, fine-grained and of agreeable flavor; tops small; has a short stump-shaped root; grows well in shallow soil; one of the best for early out-door planting and for table use.

95A—Pkt. 5 cts.; oz. 10 cts.

CAULIFLOWER

K-H DANISH GIANT or DRY WEATHER—This variety is about ten days to two weeks later than our Snowball and Dwarf Erfurt. It is of dwarf growth, producing very large, stone-hard and snow-white heads, fully protected by the foliage. As indicated by the name, it is especially fit for dry and hot weather climates, or for sections subjected to long, dry seasons, being a sure header when all other sorts fail. It cannot be forced, but in cultures or open ground, this Cauliflower gives the highest yield.

110A—Pkt. 5 cts.; oz. \$1.50.

K-H HENDERSON'S EARLY SNOWBALL—Its dwarf habit and short outside leaves allow it being planted very closely together. An extremely early variety producing magnificent white heads of finest quality. For market gardeners' use, it is one of the most profitable. Excellent for table use.

111A—Pkt. 5 cts.; oz. \$1.50.

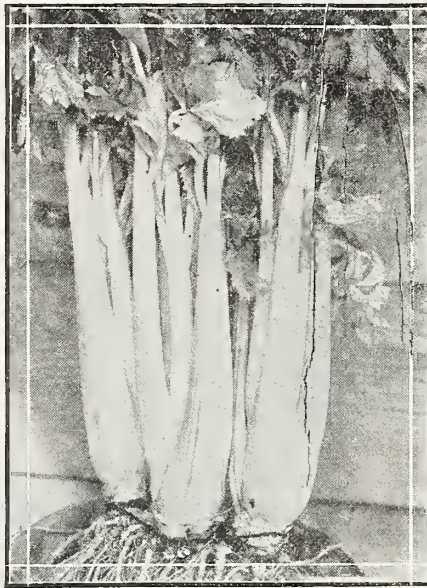
EARLY DWARF ERFURT—One of the popular varieties used in this section for the market garden. Plants are compact with few narrow, upright leaves, making it especially valuable for close planting and large yields. Heads are extra large in size, pure white and averaging eight to nine inches in diameter. Market gardeners will find this variety runs very even in size.

112A—Pkt. 5 cts.; oz. \$1.50.

CRESS OR PEPPERGRASS

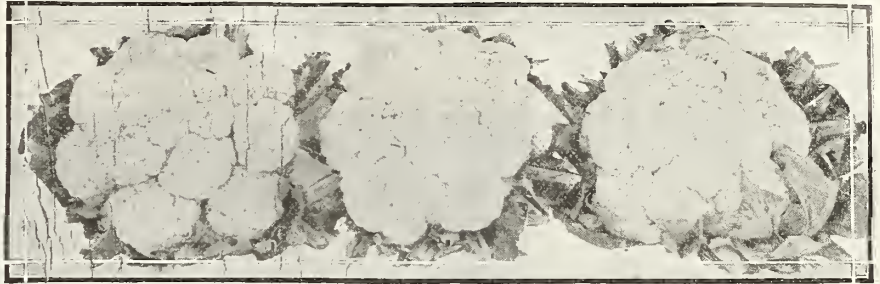
Native of Persia. An annual early vegetable used as a salad and for garnishing, and of the easiest culture. It should be sown very early in the spring in the hotbed or outdoors in rows one foot or less apart. As it quickly runs to seed, a succession of seedings should be made every eight to ten days. It is in demand only in the early spring or in winter. It can easily be grown in a window box in a dwelling house. Flowers are white and small; seeds comparatively large.

115A—Pkt. 5 cts.; oz. 10 cts.



K-H Paris Golden Self Blanching. 100A

CAULIFLOWER



Refer again to the Cauliflower listed on page seven, then note the following:

Cauliflower belongs to the cabbage family and requires similar treatment; if anything, the soil should be more heavily manured. Cauliflower requires an abundance of water, especially while heading. Sow the seed in a hotbed during January or February; when plants are large enough, transplant them two to three inches apart in boxes; let them remain in hotbed until such time as it is safe to plant outside; slightly harden off before transplanting, by leaving hotbed open during fine days. The plants will stand a slight frost.

To insure nice white heads, the outer leaves of the plants should be tied over to protect the heads from the sun. Liberal supplies of liquid manure or water, when heading has started, will insure rapid development of nice solid heads. When danger of hard frost is in sight, small immature heads should be pulled up and planted in cold

cellar or frame where they will grow and make nice heads. A good fertilizer for Cauliflower is one containing 3 to 4 per cent Ammonia and 6 to 10 per cent Acid Phosphate. Nitrate of Soda is excellent for forcing along backward plants.

Gardite Guards Your Garden. See page 39 for particulars.



K-H Chicago Pickling Cucumber. 120A

CUCUMBERS

Cucumbers, like many other vegetables, can be started in hotbeds or cold frames. A few seeds are planted in pots or berry boxes; they are allowed to make steady growth until the outdoor conditions are right for transplanting. Care must be taken at the time of transplanting not to disturb the roots. This can be done by thoroughly watering the pots or boxes a few hours before transplanting. This method of starting Cucumbers insures fruit very early, very naturally increasing their value for the market. Cucumber seed should be sown outdoors only when the soil is in nice warm condition, as the seed if sown in soil that is cold and damp, will not germinate. Cucumbers will grow in any reasonably good soil that is exposed to the sun. Plant the seed in hills, 20 seeds to the hill; as soon as the young plants begin to crowd, thin them out to three to four plants to the hill. The Striped Beetle which at times is very troublesome to young Cucumber plants can be checked by dusting with tobacco dust. To insure rapid growth and heavy production of Cucumbers, a fertilizer containing 3 to 6 per cent Ammonia and 8 to 10 per cent Acid Phosphate should be applied to the roots during the early growing season. Nipping the runners after the bloom has set will hasten the development of the fruit.

K-H CHICAGO PICKLING—A most excellent pickling sort; very uniform, productive and of good color. Our strain is much superior to stocks generally sold under this name.

120A—Pkt. 5 cts.; oz. 15 cts.

DAVIS' PERFECT—An extra long, dark green type of White Spine; retains its color and good qualities long after being pickled; fruit is exceptionally long, smooth, and tapering at both ends; flesh crisp, solid, with few seeds; mid-season.

121A—Pkt. 5 cts.; oz. 20 cts.

K-H EARLY FORTUNE—The finest type of White Spine yet produced. Early, very productive and disease-resistant; fruits nine inches long, slightly tapering; flesh white, very firm and crisp, with very few seeds; color rich, dark green, which does not fade when shipped a long distance.

122A—Pkt. 5 cts.; oz. 20 cts.

EARLY FRAME or **SHORT GREEN**—Vigorous and productive; medium in size and earliness; good for pickling and slicing; fruit light green and is inclined to be three-sided rather than round.

123A—Pkt. 5 cts.; oz. 15 cts.

K-H IMPROVED LONG GREEN—It is one of the handsomest and best long green we know of. A very heavy cropper, the fruit being large, of a dark green color, and extra solid. The flesh is a beautiful white, crisp, with a delicious flavor; this, with firmness of the flesh, for which this strain is remarkable, renders it unequalled for pickling purposes, and when ripe, the very best for sweet pickles.

124A—Pkt. 5 cts.; oz. 15 cts.

EXTRA EARLY WHITE SPINE—The earliest type of White Spine cucumber in cultivation, and one of the most prolific varieties. The fruits are large and symmetrical in shape, and of a rich dark green color, which is permanent. The flesh is pure white firm and crisp, with comparatively few seeds, and is unsurpassed for quality. This in an ideal forcing variety and succeeds equally well when planted outdoors.

125A—Pkt. 5 cts.; oz. 20 cts.

SWEET CORN

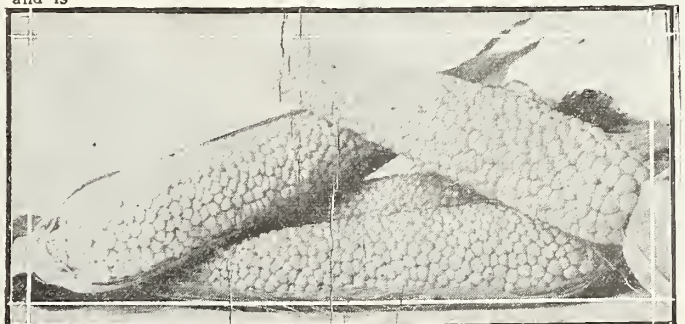
Should be started in warm soil

Sweet Corn seed is very sensitive to cold conditions of soil and climate. It should never be planted until the soil has become nicely warmed by the early summer sun and rain. Sweet Corn, planted in cold soil, will not germinate freely; sometimes 50 to 75 per cent of the seed will rot in the soil; on the other hand, the same seed planted in nice warm soil will produce a 100 per cent stand of fine healthy plants.

To insure extra early Sweet Corn, plant a few kernels in pots in a hotbed and transplant as soon as weather conditions are favorable; before transplanting, thoroughly water the plants so that they can be removed without disturbing the soil around the roots. When purchasing fertilizer for Sweet Corn, secure a grade with a fair percentage of Acid Phosphate, 10 per cent at least.

STOWELL'S EVER-GREEN SWEET CORN

A great early summer feed for hogs. We have on hand a large stock of Stowell's Evergreen Sweet Corn which we offer to our customers at a special price. We want them to plant a few acres for the hogs. Sweet corn makes the richest kind of feed for hogs of all ages; it comes in at a time when feed is most badly needed; before field corn or rape is ready; as a finishing feed for hogs nothing equals it. It puts on weight quicker than any other feed and at less cost. Our Stowell's Evergreen Sweet Corn was raised especially for the canning factories, and is therefore high grade seed. Our price f. o. b. Waterloo, 1 bushel, \$4.25; 5 bushels, \$20.75; 10 bushels, \$40.50.



K-H Country Gentleman Sweet Corn, 134A.

K-H PEEP O' DAY (Extra Early)

—The earliest of all sweet corn, and on this account especially adapted to Northern latitudes where other varieties are hard to grow. It is pure white in color, tender, juicy and sweet. It is perhaps the best kind for the home garden, owing to its earliness. Almost everyone looks forward to their first picking of sweet corn; and if you put in a batch of Peep O' Day you certainly will be able to satisfy your desires for early corn.

130A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.; 5 lbs. \$2.

EARLY MINNESOTA—A standard early sort of excellent quality, especially desirable where seasons are short. The ears bear 8 to 10 rows of large white grains. This variety is popular on account of its great productiveness. Excellent for market, home or canning use.

131A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.; 5 lbs. \$2.

K-H GOLDEN BANTAM (Extra Sweet)—The most popular of all the early sweet corns. The demand for Golden Bantam is enormous, and great difficulty is experienced by seed houses in keeping the supply equal to the demand. It is rapidly taking the place of the white and older varieties on account of its superior quality. Golden Bantam is the richest in flavor of all the sweet corns. Its pale creamy yellow kernels are delicious and sweet.

132A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 50 cts.; 5 lbs., \$2.25.

STOWELL'S EVERGREEN—The standard and best known sweet corn. Ears 8 to 9 inches long, 16 to 18 rowed, with a very deep, sweet grain. Our strain of this variety is noted for its uniform, deep grain, small cob and high quality.

133A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.; 5 lbs. \$2.00.

POP CORN

Along with school days and long winter evenings comes the desire for pop corn balls and crackerjack that can be made in the home. Nothing is enjoyed more by children and grown-ups than crispy, flaky corn popped over a sputtering fire around which they can spend a real old-fashioned evening at home. Pop corn, too, is wholesome as a food.

IMPROVED WHITE RICE—This is the original well-known variety of White Rice, and more extensively used than any other variety. Our stock of this pop corn is true to name, and can be depended upon to give entire satisfaction.

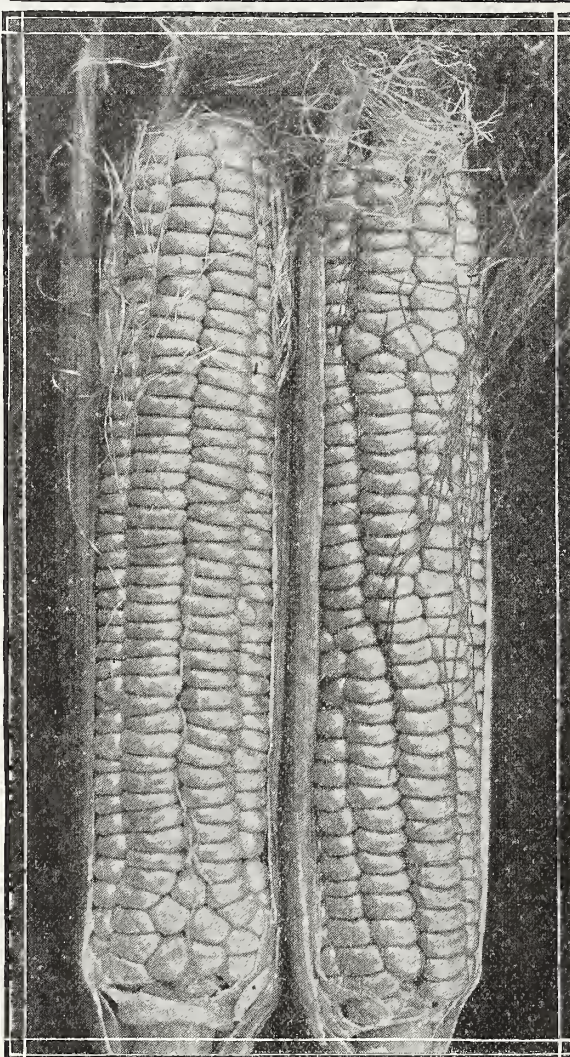
145A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 10 cts.; 1 lb. 25 cts.

IMPROVED BABY RICE—The Baby Rice Pop Corn is the latest improvement along pop corn lines. It is gaining for itself a great reputation. Pop corn men claim that one pound of Baby Rice pop corn is equal to two pounds of any other kind, due to its immense popping qualities. Our stock of this seed has been especially raised for us by an expert grower of pop corn, and you can therefore depend upon getting the genuine Baby Rice when ordering from us.

146A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 10 cts.; 1 lb. 25 cts.

IMPROVED TOM THUMB—This is a great improvement on the White Rice. The ears are about one-half the length, but they produce about as heavily in bushels as the White Rice. This is a good popping variety.

147A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 10 cts.; 1 lb. 25 cts.

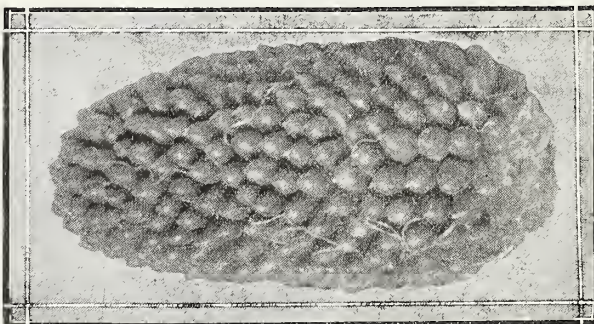
SWEET CORN

K-H Golden Bantam, 132A

DANDELION---For Salads

IMPROVED BROAD LEAF—A distinct, very early variety, forming a rosette of large, broad leaves. 150A—Pkt. 5 cts.

IMPROVED THICK LEAF—One of the best, forming a regular tuft of rather upright growth, blanches readily. 151A—Pkt. 5 cts.



Improved Baby Rice Pop Corn, 146A

K-H COUNTRY GENTLEMAN—

This variety is often called the "shoe peg" corn, owing to the arrangement of the crowded kernels, which are long and very sweet. Our seed of this variety has been carefully selected and is true to name. It is nearly as sweet as the Peep O' Day and is far ahead in flavor of any of the late varieties. It remains tender and fit for use longer than most sorts, as the ear is enclosed in a thick husk which keeps it "in the milk." The ears average 9 inches in length and are borne from two to five and sometimes six on each stalk. The cob is small and very closely packed from tip to butt with tender, pure white kernels of the finest quality. If you try this variety you will like it.

134A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.; 5 lbs. \$2.00.

EARLY EVERGREEN—This is a very popular sweet corn. It is in the second early class, comes to maturity fully 10 to 12 days earlier than Stowell's Evergreen and yields large, handsome ears of most delicious flavor. It has a ready sale on the market on account of its handsome appearance and earliness.

135A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.; 5 lbs. \$2.00.

HOWLING MOB—This variety originated at Toledo, Ohio; and its queer but appropriate name has reference to the loud and clamorous demand for the corn when brought to the market. The stalks are usually about five feet in height and produce early in the season two splendid ears to a stalk. The ears are 7 to 9 inches in length and are well covered with a heavy husk, affording protection from the green worms which so often are destructive to early varieties. There are 12 to 24 rows of good sized white kernels.

136A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 50 cts.; 5 lbs. \$2.25.

EGG PLANT

NEW YORK IMPROVED PURPLE (Spineless)—The favorite market variety. Plant large, spreading and spineless, producing 4 to 6 large oval fruits of dark purple color. 155A—Pkt. 5 cts.

BLACK BEAUTY—Earlier and nearly as large as New York Purple; fruit very dark purple; which holds its color for a long time.

156A—Pkt. 5 cts.

ENDIVE

BROAD LEAVED BATAVIAN—Leaves are broad, thick, green, more or less twisted and waved with white midribs. It forms large hearts, which, when blanched, form one of the best winter salads. Crisp, tender and of fine flavor. 160A—Pkt. 5 cts.

GREEN CURLED—Has very curly leaves, the midrib being white and blanched, and the outer edges very much indented and crested. A very attractive plant and one of the very best varieties.

161A—Pkt. 5 cts.

ORNAMENTAL GOURDS

ORNAMENTAL—Climber. Quick growing vines; excellent for covering arbors, walls and waste places. Gourds grow in very curious shapes and are used for house ornaments.

165A—Pkt. 5 cts.

HERBS

There is always room in your garden for a few pot herbs. The leaves and stems may be used for flavoring during the summer, or the young stems gathered, tied in bunches and dried for winter use.

170A—Anise. 171A—Sweet Basil. 172A—Coriander. 173A—Dill.
174A—Large Sweet Fennel. 175A—Horshound. 176A—Lavender.
177A—Sweet Marjoram. 178A—Sage. 179A—Thyme. Any Herb seed, 5cts. per packet.

KALE

K-H DWARF CURLED—This is more hardy than cabbage and makes excellent greens for winter and spring use. The leaves are curly, bright green, very tender and delicate in flavor. Sow seed in May or June, transplant in July and cultivate same as cabbage. For early spring use, sow in September and protect it over winter with a covering of straw or litter.

180A—Pkt. 5 cts.; oz. 20 cts.

KOHL RABI

K-H EARLY WHITE VIENNA—The edible part of this plant is the bulb, which grows on a stalk a few inches above ground. Sow the seed in drills, allowing 16 to 18 inches between the drills, and thin to 4 to 6 inches apart in the row. First sowing may be made as soon as the ground can be worked in the spring, and successive sowings repeated later. When young and tender, they are fine for table use; when matured, they keep splendidly and are excellent for stock. Greenish white outside with clear white flesh; smooth short leaf, good for forcing; extra fine in quality. One ounce of seed will sow 300 feet of drill. Matures in 8 to 10 weeks.

181A—Pkt. 5 cts.; oz. 20 cts.

LEEK

K-H LARGE AMERICAN FLAG—The Leek is generally considered superior to the onion for soups, being of milder and more agreeable flavor; it is very hardy and easily cultivated. Sow in drills, one foot apart in April, and transplant when large enough in rows 30 inches apart and 6 inches from plant to plant. Plants should be set five inches deep in rich, moist soil. One ounce of seed will produce about 1,000 plants.

183A—Pkt. 5 cts.; oz. 20 cts.



Big Boston Head Lettuce. 185A

K-H NORTHERN KING—This lettuce is without doubt the best of the heading varieties. The heads are of medium size, hard, crisp and sweet. Our Northern King withstands adverse conditions of climate better than any of the other heading kinds. The inner leaves blanch to a beautiful golden-yellow, making them very attractive on the table. Very quick growing.

189A—Pkt. 5 cts.; oz. 20 cts.

Loose Leaf Varieties

BLACK SEEDED SIMPSON—One of the best, either for forcing under glass or for open ground cultivation. It forms large, thin, loose leaves of light green color; very tender, crisp and of fine quality. A fine sort for summer, as it withstands the heat; also good for the home garden.

190A—Pkt. 5 cts.; oz. 15 cts.

GRAND RAPIDS—As a lettuce for forcing, this variety stands at the head of the list, being of quick growth, hardy, and remaining in condition several days after being fit to cut. The plant is upright and forms a loose cluster of large, thin, bright green leaves, savoyed, finely crimped at edges.

191A—Pkt. 5 cts.; oz. 15 cts.

PRIZEHEAD—A large, loose headed, thin leaved sort. The very large leaves are crimped, bright green, tinged on the edges with reddish-brown and are crisp and sweet.

192A—Pkt. 5 cts.; oz. 15 cts.

LETTUCE

K-H NORTHERN QUEEN—To our customers requiring a really good, loose-leaf lettuce, we strongly recommend our Northern Queen. It's a rapid grower; leaves are very tender and sweet; color is an attractive yellowish-green; the plants are of good size and shape, making them attractive as a market garden variety. Our Northern Queen is a good variety for growing under glass.

193A—Pkt. 5 cts.; oz. 20 cts.

PARIS WHITE COS or CELERY LETTUCE—A very distinct variety of lettuce, having large, elongated, compact heads, that blanch mild and crisp. The plants are of erect growth, forming a tall, slightly oblong bunch of large, crisp leaves.

194A—Pkt. 5 cts.; oz. 20 cts.



K-H Large American Flag Leek 183A

LETTUCE

Quick growth is necessary to insure nice crisp lettuce. Good lettuce can be grown on any good average soil; care should be taken to see that the plants are not crowded; plants should stand not less than six inches apart in the row. Lettuce can be forced by an occasional application of liquid fertilizer; Nitrate of Soda is especially good for forcing lettuce to early maturity.

Head Varieties

BIG BOSTON—The most popular variety for every purpose on the market. Gives equally good results under glass or in the open. Of the head types it is easily the leader. Leaves are light green and very tender. Our strain of this variety is unsurpassed.

185A—Pkt. 5 cts.; oz. 15 cts.

IMPROVED HANSON—Heads large, fine form, deliciously sweet, tender and crisp; color green outside and white within. Intermediate between the loose-leaved and heading varieties.

186A—Pkt. 5 cts.; oz. 15 cts.

MAY KING—A large light green heading lettuce which is giving excellent satisfaction. Grown outdoors it is extremely early, maturing handsome heads of good size and quality and solid enough to make it a good shipper to distant markets. For forcing under glass it is most desirable. A first-class all-purpose variety.

187A—Pkt. 5 cts.; oz. 15 cts.

WAYAHEAD—A very early variety of handsome appearance and fine quality. The outer leaves are a light green with the inner head finely blanching to a rich buttery-yellow.

188A—Pkt. 5 cts.; oz. 15 cts.

Protect Lettuce From Insect Pests

Lettuce plants are subject to attack during the growing season from insect pests. These attack the leaf and stem and render the plants unsightly; they also retard the necessary rapid growth of the plant so necessary to insure nice, crisp lettuce. Rapid growth is the one essential to the successful raising of good lettuce. Slow growing lettuce becomes bitter and tough, and is quite unsuited for human consumption. Encourage the rapid growth of lettuce by protecting it from insect pests. Keep the plants dusted with GARDITE, the guardian of the garden. GARDITE kills insect pests and helps the development of the lettuce. A can of GARDITE sufficient for the home garden costs only 35 cents. GARDITE is a real trouble saver. See page 39.

MELONS—MUSKMELONS—WATERMELONS

K-H HONEY DEW—Honey Dew is a new type of muskmelon. The color is dull white when ripe, size about six inches in diameter from top to bottom and seven to eight inches long, all melons being nearly the same size. Weight averages eight to ten pounds. The Honey Dew muskmelon has no netting, but the rind, though thin, is very tough and so close that the excellent flesh is practically sealed up and it keeps in fine condition for two to three months after the crop is gathered. Color of flesh a rich green from close to the rind to the seed cavity and the flavor delicious to all who enjoy a good muskmelon. It has the sweetness of honey and the freshness of morning dew. We recommend sowing the seed in the northern states in pots or cold frames after April 15th, so that established plants may be ready for setting in the open ground June 10th to 20th.

209A—Pkt. 5 cts.; oz. 20 cts.; $\frac{1}{4}$ lb. 60 cts.

K-H ROCKYFORD CANTALOUPE (Rust Resistant)—Under favorable conditions, when other strains rust badly, the vines of this strain remain green and thrifty, continuing to blossom and set on fruits. The value, owing to this quality, is great; as in many localities, rust often destroys the crop; and when other strains have lost their quality on account of rust, this strain continues to ripen melons of the highest quality. It yields a heavy crop, continuing long in bearing.

208A—Pkt. 5 cts.; oz. 15 cts.; $\frac{1}{4}$ lb. 45 cts.

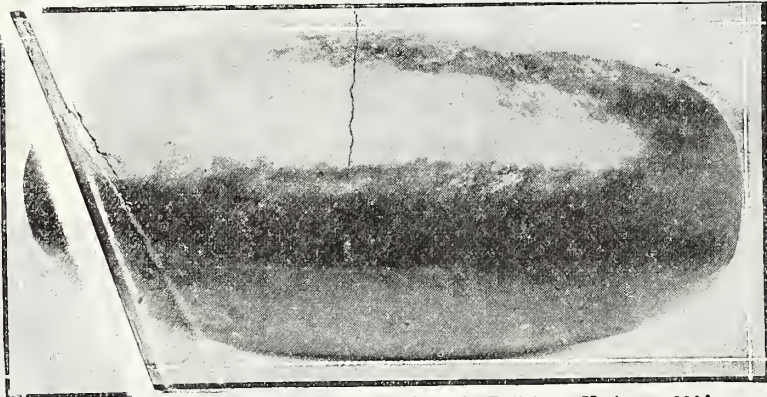
WATERMELONS

COLE'S EARLY—This is one of the earliest melons and a very hardy, sure cropper; medium size, slightly oblong shaped; rind green, striped with lighter shades; flesh dark red.

220A—Pkt. 5 cts.; oz. 12 cts.; $\frac{1}{4}$ lb. 30 cts.

DIXIE—Fruit is large and oblong in form, from 22 inches to 24 inches in length; skin dark green striped with a lighter shade. Flesh bright scarlet; ripens closely to the rind. Excellent keeping qualities.

221A—Pkt. 5 cts.; oz. 12 cts.; $\frac{1}{4}$ lb. 30 cts.



K-H KLECKLEY Sweet Watermelon—A Delicious Variety. 224A

K-H HALL VERT HONEY—Claimed by the originators to be the finest of all watermelons for the home garden and for local markets. It fully equals the Kleckley Sweet in superb, luscious flavor, and fruits are more even and regular in outline, with a darker, richer colored skin. The vines are of strong, vigorous growth and set fruits very free. Will ripen choice fruits even in the northern states if planted in a good location. The melons average 18 to 20 inches in length and are full or bluntly rounded at both ends. The skin is a dark, glossy green. The flesh is a good flavor. One of the best to grow in the North, and being so good it is one that should be in every garden.

222A—Pkt. 5 cts.; oz. 12 cts.; $\frac{1}{4}$ lb. 30 cts.

PEERLESS or THE CREAM—An early variety of good flavor. One of the best to grow in the North, and being so good it is one that should be in every garden.

223A—Pkt. 5 cts.; oz. 12 cts.; $\frac{1}{4}$ lb. 30 cts.

K-H KLECKLEY SWEET (Monte Cristo)—This splendid, sweetest and most delicious watermelon has become very popular wherever it has been given a thorough test. While the skin is perhaps too thin to admit of melons being shipped very great distances to market, it is most desirable to plant for home use and for local markets. The melons are very large, oblong in form, averaging 18 to 20 inches in length by 10 to 12 inches in diameter, of a dark green color. The flesh is a bright scarlet, with broad, solid heart. Crisp, sugary and free from stringiness.

224A—Pkt. 5 cts.; oz. 12 cts.; $\frac{1}{4}$ lb. 30 cts.



K-H Honey Dew Muskmelon. 209A

RATTLESNAKE—Has long been a popular melon with shippers. It is a long melon, having a white rind, with dark green stripes. Flesh of excellent flavor.

225A—Pkt. 5 cts.; oz. 12 cts.; $\frac{1}{4}$ lb. 30 cts.

K-H SWEETHEART—This very popular melon is one of the best. It is an entirely distinct and handsome watermelon. Fruits large and heavy, of oval or round form. Skin very pale green, with distinct netted lines of a slightly darker shade. Flesh deep rich red, solid crisp and deliciously sweet. The large, handsome fruits bear shipping well. The melons retain their good qualities for a long time after ripening and being gathered.

226A—Pkt. 5 cts.; oz. 12 cts.; $\frac{1}{4}$ lb. 30 cts.

TOM WATSON—Probably the best shipping melon, and one of the best main crop sorts; grows a very large size. Fruit large and long in shape, colored a medium green with a light tracing of a darker shade, not unlike Peerless in its coloring; flesh rich red and of good quality; seeds white. We have a very fine selection of the seed of this melon.

227A—Pkt. 5 cts.; oz. 12 cts.; $\frac{1}{4}$ lb. 30 cts.

ONION SETS

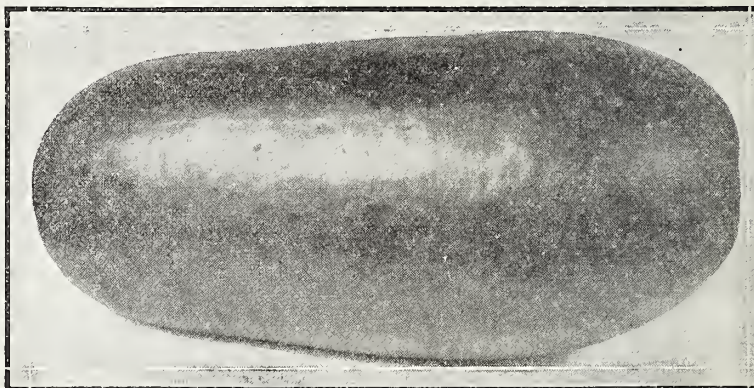
We have a very fine stock of onion sets, all especially screened and in good condition; however, order early as our stock is limited. Onion sets will produce an onion crop much quicker than seeds.

ONION SETS WILL BE SHIPPED AS EARLY AS WEATHER CONDITIONS WILL PERMIT.

253A—RED: 1 lb. 25 cts.; 3 lbs. 65 cts.; 6 lbs. \$1.20.

254A—WHITE: 1 lb. 25 cts.; 3 lbs. 65 cts.; 6 lbs. \$1.20.

255A—YELLOW: 1 lb. 25 cts.; 3 lbs. 65 cts.; 6 lbs. \$1.20.



Tom Watson. An Old Favorite. 227A

A NEW HYBRID MUSKMELON—A Novelty for 1920!

Johnston's Golden Heart

Melons will weigh from 7 to 18 pounds each. Flesh is a rich golden color. Very early.

J. D. Johnston of Waterloo is known in this territory as the Melon King. Every year he raises thirty to fifty acres of melons for the market. He is a very keen grower, has been raising melons for thirty years and knows all the good ones. Mr.

Johnston says he has been working on his Golden Heart muskmelon for years to get it in shape for the market. He claims it is the earliest muskmelon for the North, being at least ten days earlier than any other. The flesh is a rich deep golden color, of delicious flavor and very sweet. The fruits, which are both round and oblong in shape, are borne on exceptionally strong vines which are practically

Johnston's Golden Heart Muskmelon. Rich Golden Flesh of Delicious Flavor.

disease-resisting. We purchased Mr. Johnston's entire crop of Golden Heart muskmelons as we were anxious to give our customers an opportunity to secure some of this delicious fruit. We have tried these fine melons ourselves and don't hesitate to pronounce them the most delicious we ever tasted. Every home garden should have a patch of Golden Hearts this season; they will be heartily appreciated by everyone who grows them.

210A—Pkt. 10 cts.; oz. 25 cts.; ¼ lb. 75 cts.

BURRELL GEM MUSKMELON—A superior new orange-fleshed shipping melon. Of splendid flavor, sweet and aromatic, oblong shape, smoothly rounded ends, closely netted and slightly ribbed; dark green skin. Rind thin but very tough; flesh exceptionally deep rich salmon-orange color. Fruits average six inches long by four inches deep. Very fine for marketing.

200A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

BANANA MUSKMELON—This curious melon attains a length of 15 to 20 inches, and from 4 to 6 inches in diameter. The salmon-colored flesh is thick and of a delicious flavor.

201A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

K-H HOODOO (Heart of Gold)—The flesh of the Hoodoo muskmelon is fine-grained and sweet; deep orange in color and extremely thick, with a very small seed cavity. Fruits are nearly round in shape and about the size of the Rockyford. The Hoodoo is a splendid melon for the market and hotel trade. As a shipper it cannot be surpassed. It is a wonderfully prolific sort of muskmelon, and a great favorite where introduced and thoroughly tried. We cannot recommend it too highly.

202A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

MONTREAL GREEN NUTMEG (Montreal Market)—Excellent; very large, often weighing 18 to 20 pounds; fruit round, flattened at both ends, light green, deeply ribbed and well netted; flesh remarkably thick and of superior quality.

203A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

K-H TIP TOP—The melons are round in form, of large size, evenly ribbed, moderately netted and very productive. It is sweet, juicy and delicious. The flesh is firm, but not hard, and is edible almost to the rind. It is a strong grower, heavy yielder and of handsome appearance and is one of the best of the orange-fleshed sorts. Well suited for both the home garden and the market.

204A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

PAUL ROSE OR PETOSKEY—This is a cross of the Osage with the Netted Gem. The fruits are nearly round or slightly oval, ribbed and heavily netted; of a light green or golden hue when fully ripe. The flesh is thick, of deep orange color, and ripens close down to the rind with small seed cavity. It is an excellent shipping variety.

205A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

K-H GOLD LINED ROCKYFORD—This is the most popular of the small melons, being extensively grown and shipped in carloads for the markets. It is one of the finest early melons, and one of the best for market gardeners and shippers, and for the home garden. It is oval in shape, slightly ribbed, and covered with a coarse netting. The flesh is thick, green in color, very sweet and juicy, and solid clear to the rind.

206A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

OSAGE OR MILLER'S CREAM—Fruit medium sized, oval, slightly ribbed, dark green in color, banded with lighter streaks, covered more or less with shallow netting. The flesh is deep salmon color and very thick, there being but a slight cavity in the center of even the largest fruit; the quality is exceptionally fine.

207A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

Scene on Johnston's Melon Farm near Waterloo, Iowa.

CITRON—MUSTARD—OKRA—ONIONS

RED SEEDED CITRON—Small, dark rind, round melon used for jam and preserving. It has an excellent flavor.

230A—Pkt. 5 cts.; oz. 20 cts.

SOUTHERN GIANT CURLED MUSTARD—Plant vigorous and hardy, of upright spreading growth; leaves large, light green-tinged yellow, much crumpled and frilled at the edges. The popular market variety in the South; seed small, dark reddish-brown.

235A—Pkt. 5 cts.; oz. 15 cts.

LONG GREEN OKRA—The pods are 3 to 4 inches long, deep green in color, and when young are absolutely stringless. Every home garden should have this variety, as should also the market gardener.

237A—Pkt. 5 cts.; oz. 12 cts.

WHITE VELVET OKRA—On account of its attractive white color, good flavor and tender pods when quite young, it has long been a favorite variety.

238A—Pkt. 5 cts.; oz. 15 cts.

ONIONS

Onions require good, rich land, free from weeds. Onions also require a firm seed bed. To insure this, it is a good plan to roll or tramp the rows after seeding. Good onions will not develop when the plants are crowded. Careful attention should be given to the thinning of the young plants in the rows; this should be done as soon as the seedlings are large enough to handle. Sow onion seed as soon as the ground can be worked. Get seed bed worked as fine as possible. Sow seed in rows 15 to 18 inches apart. About 20 seeds to a foot of row will insure a nice stand of onions. Four to five pounds of seed at this rate will seed one acre. The largest varieties of onions can be successfully raised in the northern states by sowing the seed in hotbeds and transplanting to the open ground as soon as soil and weather conditions permit. Before setting out the young plants it is a good plan to cut them back a little, also prune the roots. If this is done the plants will develop quickly when transplanted.

RED WETHERFIELD—It is an enormous yielder, producing anywhere from 600 to 900 bushels per acre. The skin is a deep purplish red; flesh, pure white. The handsome bulbs often weigh up to two pounds each. It probably has a larger sale than any other red skinned onion. It matures early and the flavor is good and mild. Just the onion for boiling. A leading variety in all sections.

240A—Pkt. 5 cts.; oz. 21 cts.; ¼ lb. 70 cts.; 1 lb. \$2.50.

K-H PRIZETAKER—The handsomest, largest yellow globe onion. A good keeper, of finest flavor, handsome shape and enormous size, many single onions having been raised to weigh five pounds or over from seed the first year. The Prizetaker grows always to a perfect globe shape with a bright straw-colored skin.

241A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 75 cts.; 1 lb. \$2.75.

RICE'S WHITE PICKLING—A desirable, small, white pickling onion and the best of its class; the bulbs run very uniform in size, small and of a distinct bright, pearly-white color; mild in flavor and makes a good bunching onion.

242A—Pkt. 5 cts.; oz. 25 cts.; ¼ lb. 80 cts.; 1 lb. \$3.00.

SOUTHPORT RED GLOBE—The finest type and most popular of red onions. The bulbs are distinctly globe-shaped, with a small neck, and are excellent keepers; color, a deep purplish red. We have an unequalled strain of this variety.

243A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 75 cts.; 1 lb. \$2.75.

SOUTHPORT YELLOW GLOBE—The most largely grown yellow market onion and the most profitable. The bulbs are a true deep globe, having a small neck and heavy, thick skin which makes it an excellent storage sort; the color is a deep yellow or golden-brown, quite distinct from most stocks of this variety. The flesh is white, crisp and mild in flavor.

244A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 75 cts.; 1 lb. \$2.75.

SOUTHPORT WHITE GLOBE—Of the true Southport Globe form with a thin, delicate skin of purest paper whiteness; flesh is very crisp, fine-grained and snowy-white in color, and exceedingly mild; usually commands the highest price in the market. This seed is produced for a fancy trade from the most perfect bulbs.

245A—Pkt. 5 cts.; oz. 25 cts.; ¼ lb. 80 cts.; 1 lb. \$3.00.

MAMMOTH SILVER KING—In appearance the most striking onion grown. We hardly know which to recommend the most, its large size, symmetrical appearance and beautiful silvery flesh, or its sweetness, tenderness and mild flavor. These qualities make it the best for exhibition and fancy high-priced trade. In the North the seed should be started in frames early and transplanted about the time other onion seeds are being sown.

246A—Pkt. 5 cts.; oz. 30 cts.; ¼ lb. \$1.00; 1 lb. \$3.80.

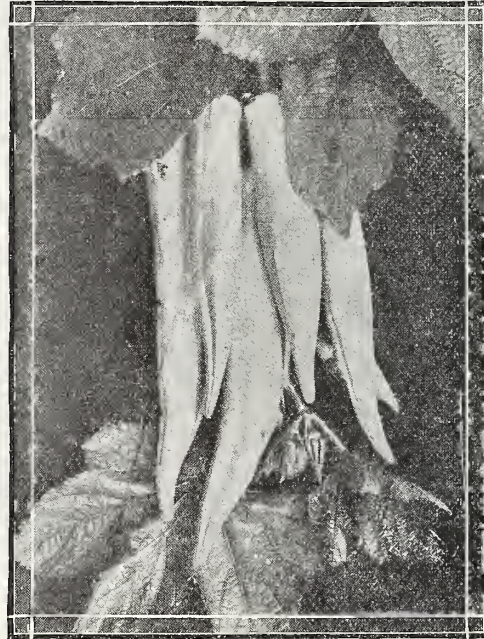
DANVERS YELLOW GLOBE—A large, early variety, an abundant cropper, very thick bulb, flat with slightly convex bottom, fine full oval top, with a small neck and rich, brownish-yellow skin; just the onion for critical growers. It is an excellent keeper and perhaps the best paying onion that is grown for general crop. It has been the leading variety for years. If you want to grow a fine crop of these handsome onions, get our specially selected seed. It is absolutely the best you can buy, and we guarantee you will be delighted with it.

247A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 75 cts.; 1 lb. \$2.75.

WHITE PORTUGAL or SILVERSKIN—The best known and most largely used white onion. Is flat on the bottom and thick toward the top. Very hard and firm and an excellent keeper. Is largely used for white onion sets as well as for market onions and pickles.

248A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 75 cts.; 1 lb. \$2.75.

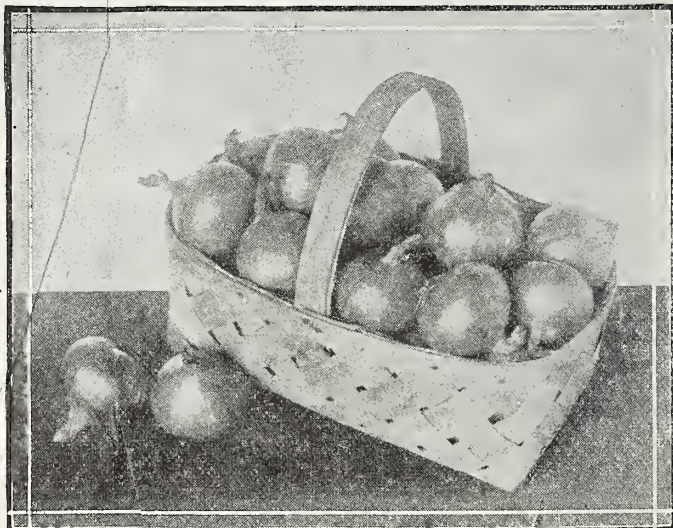
ONION SETS ARE LISTED ON PAGE 14



White Velvet Okra or Gumbo. 238A



Southport Red Globe Onion. 243A



A Basket Full of Prizetaker Onions. 241A

PARSLEY — PARSNIPS — PEAS

K-H CHAMPION MOSS CURLED PARSLEY—A compact growing sort; leaves are a uniform dark green color, very finely cut and so closely curled as to resemble bunches of moss; one of the most useful and decorative sorts.

257A—Pkt. 5 cts.; oz. 15 cts.

EMERALD DWARF EXTRA CURLED PARSLEY—The moss-like leaves are finely curled and of a handsome bright green color; very compact in growth.

258A—Pkt. 5 cts.; oz. 15 cts.

PARSNIPS—**K-H HOLLOW CROWN** (Large Sugar)—Better known and more generally grown than any other sort; roots smooth, usually 15 inches long by 3 inches in diameter at the top; tender and sugary.

260A—Pkt. 5 cts.; oz. 15 cts.

LONG SMOOTH WHITE—A very hardy and productive sort; roots smooth and white, about 16 inches long, with an elongated, conical neck; excellent quality.

261A—Pkt. 5 cts.; oz. 15 cts.

SUTTON'S STUDENT—A very fine English strain with long, smooth roots of highest quality.

262A—Pkt. 5 cts.; oz. 15 cts.



K-H Hollow Crown Parsnip; Large and Sweet. 260A.

Something About GARDEN PEAS and their Characteristics

There are three classes of Peas; those having wrinkled seed, those having round seed and those with edible pods. For extra early sowing the round seeded varieties are the best as they are quite hardy and can withstand all the late frosts that may occur after seeding. We, however, cannot recommend them as they are much inferior to the wrinkled varieties both in size and flavor. The wrinkled class include all the best known varieties. These should not be sown until the ground begins to warm up. It would be no

exaggeration to say that 90 per cent of garden failures are due to untimely planting. Wrinkled peas, when sown in cold, wet soil cannot thrive; on the contrary many of them are likely to rot in the ground. Peas do well in almost any good soil. Plant dwarf varieties in rows thirty inches apart and the tall varieties require the rows five feet apart. For best results the tall growing peas should be supported with brush or other material. A fertilizer, rich in potash and phosphoric acid is most beneficial for the pea crop.

Garden Peas—Early Dwarf Varieties

BLISS AMERICAN WONDER—The earliest of all wrinkled peas. Of dwarf habit, growing from 9 to 11 inches high, and producing a profusion of good-sized and well-filled pods of the finest flavor.

270A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

K-H EXTRA EARLY PREMIUM GEM (Peaceable)—An improved and more dwarf strain of McLean's Little Gem. Height 18 inches; foliage dark green; pods light green 3 inches long, round, square ended and well filled with six to eight light green peas of good quality; very productive.

271A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

LAXTONIAN—The largest podded of all the early dwarf peas. The dark green pods are similar to the Gradus in shape, and nearly as large in size; they mature earlier and require no support of any kind. Vigorous and very productive, growth about 15 inches; pods are well filled with peas of the finest flavor.

272A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

K-H LITTLE MARVEL—An extra fine dwarf sweet pea. Pods somewhat larger than Nott's Excelsior and same season. A fine variety for either private or market gardens. Height 14 inches. Foliage and pods very dark green; pods 3 inches long, nearly round, and square ended, containing 7 very dark green peas of high quality; very productive.

273A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

K-H PETER PAN—One of the very finest of the large podded, dwarf peas, on the order of Laxtonian, though somewhat earlier. Height 15 inches; vine and foliage stout, heavy and dark green; pods 4 inches long, very broad, straight and pointed, containing 6 to 8 very large, dark green peas of superb quality.

274A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

NOTT'S EXCELSIOR—Height 14 inches. This variety resembles the American Wonder, but grows a trifle taller and the pods are somewhat larger. It is of compact, dwarf growth and is nearly as early as the American Wonder. The pods average 3 inches in length and are well filled to the squared ends with green, wrinkled peas of fine quality and sweet flavor.

275A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

PEAS—Tall or Climbing Peas

MAMMOTH PODDED EXTRA EARLY—On the order of Rice's Extra Early, but pods one-fourth larger. Matures practically with Extra Early and Alaska, and is much more productive; seed large, smooth and white. Vine and foliage robust, heavy and medium green. Height 3 feet. Pods light green, 4 inches long, round, broad, saddle-backed and square ended, containing 7 extra large, light green peas. A very productive and extra fine sort, bound to take first place as a leading market gardeners' first early pea.

276A—Pkt. 5 cts.; ¼ lb. 12 cts.; 1 lb. 45 cts.

THOMAS LAXTON—The only rival of the famous Gradus. Extremely early, wrinkled pea; long pod. In some respects we consider it better than Gradus; pods are of a deep rich green. Peas very sweet; deep green.

277A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.

FIRST AND BEST (Frost Resisting)—An extra early pea with a great reputation in all districts. Vines vigorous and hardy, 24 inches high, bearing as many as seven fine straight pods, each containing 5 to 7 handsome peas of delicious quality; a very heavy cropper, and good drought resister. Can be planted earlier than any other pea, as it is not hurt by frost.

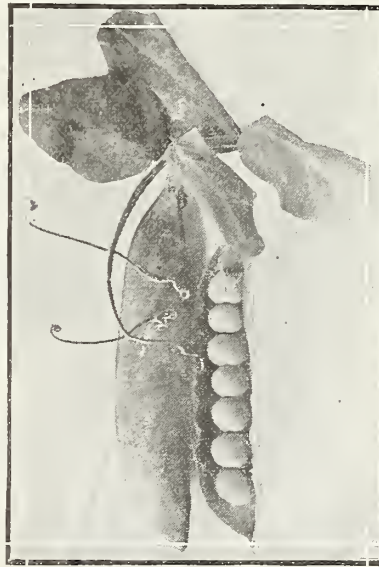
279A—Pkt. 5 cts.; ¼ lb. 12 cts.; 1 lb. 45 cts.



Bliss American Wonder Pea. 270A.

GRADUS or PROSPERITY—A standard, early large podded variety, very popular with market gardeners. Height 30 inches. Vine and foliage moderately heavy and medium green; pods medium green, 4 inches long, semi-round, straight, slightly curved at the tip, and pointed, containing 6 to 8 large, very sweet medium green peas; very productive and of high quality.

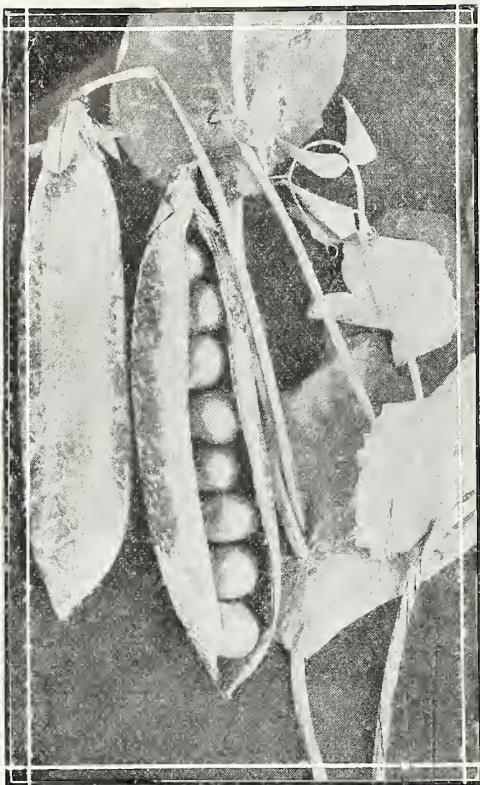
278A—Pkt. 5 cts.; ¼ lb. 15 cts.; 1 lb. 50 cts.



Gradus or Prosperity Pea. 278A.

The Improved Soil Inoculator, Nitro-Bacterium Process
NITRAGIN
 Restores and Maintains Soil Fertility
 FOR GARDEN PEAS

"NITRAGIN" FOR GARDEN PEAS—Peas inoculated with "NITRAGIN" before planting are able to gather the free nitrogen from the air; this helps to develop the plants and insures increased crops of peas. "NITRAGIN" is especially recommended for use by market gardeners who depend upon an early crop for the market. It makes healthier plants. Garden size can, 35 cts. (See page 37.)



Dwarf Telephone or Daisy Pea. 280A

PEAS, Second Early and Main Crop Sorts

DWARF TELEPHONE or DAISY—This grand 20-inch pea is rapidly gaining favor among gardeners of all classes. In habit it is dwarf and stocky. Bears close planting and requires no supports. The pods frequently measure five inches in length, and are broad, straight and remarkably well filled. A splendid mid-season variety.

280A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 50 cts.

STRATAGEM IMPROVED—It is a favorite with the market gardeners for a general crop on account of the strong vines and large peas and pods. A heavy cropper; vines are strong, vigorous, covered with large pods measuring nearly five and one-half inches in length. Peas wrinkled, vines very branching, often twenty pods to a vine; quality is excellent. Our stock has been carefully selected and will run remarkably true.

281A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.

DUKE OF ALBANY (American Champion)—A very large wrinkled pea similar to the Telephone in growth and season, but darker in color of foliage. The pods are of largest size, often 4 to 5 inches long, straight and thick, borne in great profusion, and when in condition for picking, are of a deep green color. Its productiveness and fine color make it a very profitable sort for market gardeners, while its splendid quality should give it a place in the home garden.

282A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 50 cts.

TELEPHONE—A favorite of the extra large podded varieties. Vines large; coarse leaves; height 54 inches. Pods are large, filled with enormous peas of tender, sweet and excellent flavor.

283A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 15 cts.; 1 lb. 50 cts.

RENT PAYER—A pea without a rival; about 20 inches high, the vines being strong do not require support. Tremendous cropper, the vines being literally covered with fine, long, well-filled pods of a rich, dark green color. The flavor of the peas cannot be surpassed. As an exhibition pea it is ideal. The pods are about six inches long and are usually filled with nine to ten well-developed peas. Will do well in any latitude.

284A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.

HORSFORD'S MARKET GARDEN—A fine variety of medium height; very prolific; peas small and wrinkled, but pods well filled. Dark green and hardy and very popular as a canning variety.

285A—Pkt. 5 cts.; $\frac{1}{4}$ lb. 12 cts.; 1 lb. 45 cts.

PEPPERS

CHINESE GIANT PEPPERS—One of the very largest of the mild red varieties. Plant of short, stocky growth, with light green foliage; fruits pendent, thick, blocky and square ended, four to five inches in diameter and of equal length; color, brilliant glossy scarlet.

300A—Pkt. 5 cts.; oz. 50 cts.

LARGE BELL or BULL NOSE—A standard early variety and popular as a pickling sort; the pendent scarlet fruits are two inches in diameter, three inches long and blunt ended; mild and sweet.

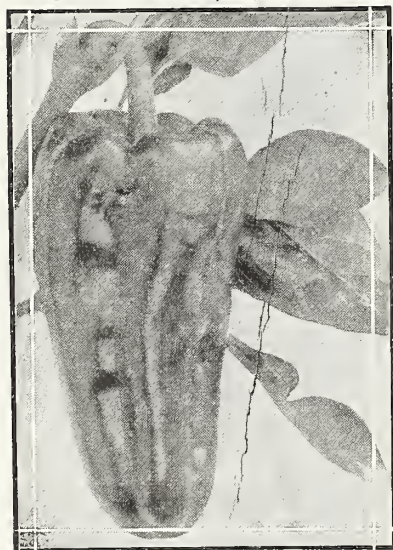
301A—Pkt. 5 cts.; oz. 50 cts.

PIMENTO—A very thick-fleshed, pear-shaped, smooth, mild, crimson variety; much used for salads.

302A—Pkt. 5 cts.; oz. 50 cts.

RUBY KING—One of the most profitable and satisfactory varieties for the home or market garden; plants are early and productive; fruits pendent, often four to six inches long by three to four inches in diameter; tapering, and of a bright, ruby-red color; flesh is thick, sweet and mild.

303A—Pkt. 5 cts.; oz. 50 cts.

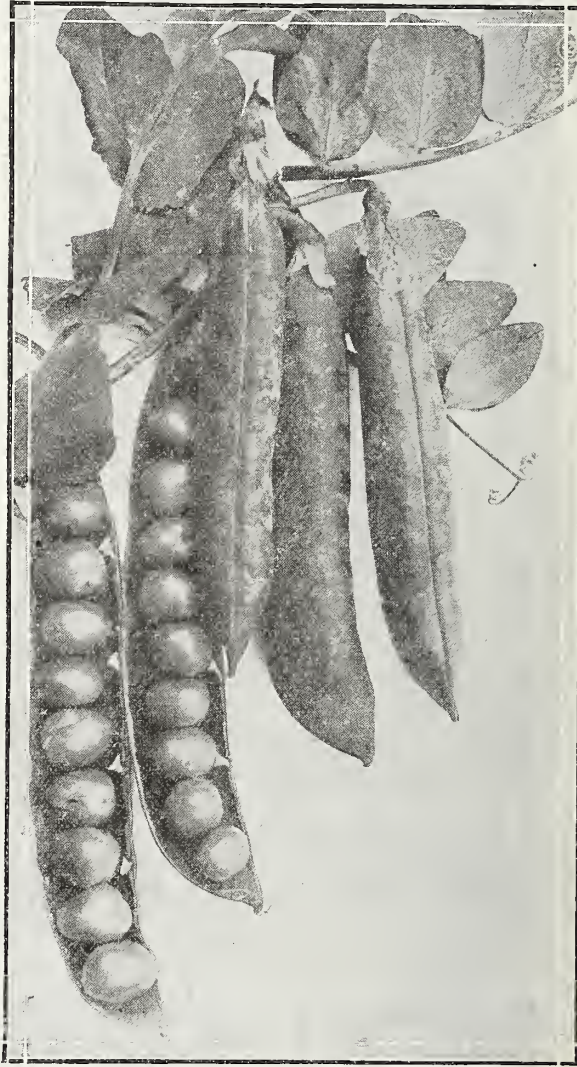


Large Bell or Bull Nose Pepper. 301A

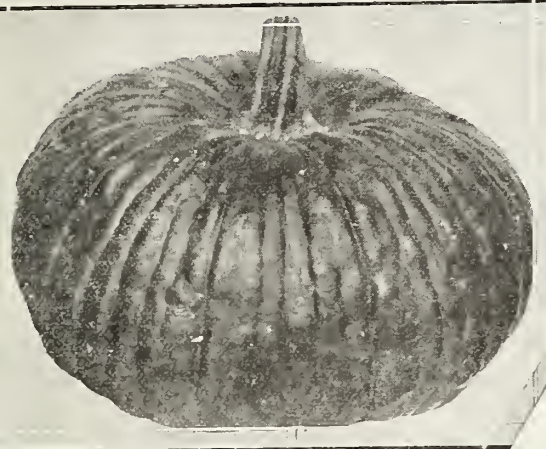
LONG RED CAYENNE—Pendent fruits about four inches long and three-fourths of an inch in diameter at the base, often curved and twisted; bright red; hot and pungent.

304A—Pkt. 5 cts.; oz. 50 cts.

PEPPERS A PROFITABLE CROP—We have never yet heard of the market being overstocked with Peppers. For the past two or three seasons, the supply has been a long way below the demand; this condition has of course stimulated prices. We know of gardeners in our own county who have cleared up hundreds of dollars the past season on Peppers. In order to get upon the market early and thereby get the best prices, it is advisable to start the Peppers in hotbeds and transplant them as soon as weather conditions are favorable. When transplanting, be sure to place the young Peppers in such a position that they can get the maximum amount of sunlight. Peppers do not succeed when planted in shady situations.



The Famous Rent Payer Pea. 284A



K-H New England Pie Pumpkin. 312A

K-H NEW ENGLAND PIE PUMPKIN

Fruit small, round, flattened at the ends, skin and flesh deep orange-yellow; flesh quality. The Pumpkin for pies like Gray. 31A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30

KING OF THE MAMMOTHS—The giant have been grown to weigh 250 pounds and reach 15 inches in diameter; fruit round and flattened, slightly ribbed bright yellow and very thick. 311A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

CONNECTICUT FIELD—Generally used for feeding, also for making pies; fruit rather oblong, 15 inches in diameter; smooth, hard, reddish-orange with rich, orange-yellow flesh. 310A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

ds, and slightly ribbed; very thick and of high mother used to make. cts.

mong pumpkins; specimen weighing 24 inches or more; skin salmon-orange, flesh.

planting in corn for stock flattened at the ends, often orange, distinctly ribbed skin

RADISHES

Too rich soil is not good for radishes. This dainty little vegetable to grow; a fairly good produce nice crisp radishes. Don't try to raise is exceptionally rich, as in this kind of soil they heavy leaf growth and very small bulbs. Do at one time; sow a little at a time successively.

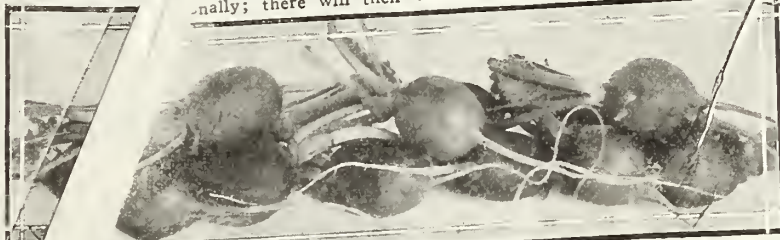
be no waste and you will always have a good for radishes. table is quite easy for the table. Radishes should not be sandy loam soil will the garden that may be needed for crop radishes in soil that can be sown between cabbage, onion, they always produce a fertilizer, with a high percentage of Acid t sow too much seed it will increase their size and crispness nally; there will then

supply of nice crisp radishes occupy any valuable part of s of greater value. Radishes parsnip or carrot rows. A Phosphate, will help radishes;

Round Summer Varieties

K-H CRIMSON GIANT GLOBE—A variety combining earliness and great size. It grows much larger than other extra early varieties, but does not become pithy, even when fully twice as large in diameter and a week older. A deep globe in shape; two inches in depth; one and one-half inches in diameter. Skip thin and of deep crimson. The flesh purest white. 320A—Pkt. 5 cts.; oz. 15 cts.

EARLY SCARLET TURNIP—Round, deep scarlet, shading very early; used extensively sort. We have a very superior. 321A—Pkt. 5 cts.; oz. 15 cts.



K-H Crimson Giant Globe Radish. 320A

is mild in flavor and of ; ¼ lb. 45 cts.

NIP, WHITE TIPPED—to a white tip on the bottom; both as a forcing and outdoor or strain of this radish. 321A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

ARKLER WHITE TIP—Quite ar to Scarlet Turnip. White ed as to size and time of maturity. root, however, is more round or shaped, and the white extends ther up on the radish, and on this count is more popular in some markets. 322A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

K-H NEW SAXA—(Extra Early; Short Top; Crisp and Sweet)—The new Saxa radish we believe to be the very best short top scarlet globe radish offered to gardeners today. It has all the desirable qualities to recommend it to both the home gardener and the market gardener. Splendid color, the flesh is perfectly white, and is delightfully crisp and palatable. 323A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 50 cts.

K-H PHILADELPHIA WHITE BOX (White Ball)—One of the best of the white varieties either for forcing or outdoor culture; more round than turnip-shaped; intermediate in size; always crisp, fine-grained and tender. 324A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

VICK'S SCARLET GLOBE—We have an exceptionally fine stock of this superb variety. It is one of the very earliest of the forcing radishes and does equally well outside; roots are of fair size, globe-shaped and with a very small top; always crisp and tender; color a bright scarlet. 325A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

are somewhat shorter, broader at the top and more Finger; also matures a little earlier; about six inches long and white throughout. 328A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

LONG WHITE LADY FINGER (White Vienna)—An early maturing, long white summer radish; roots white, slender and smooth, are 6 to 7 inches long, tapering slightly at the top. This variety grows more above ground than Icicle and consequently is more or less tinged with green at the top of the root. 329A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

K-H ROSE CHINA WINTER (Scarlet China)—One of the very best winter sorts; roots are cylindrical, or largest near the bottom; stump rooted or blunt at both ends; skin smooth and bright, deep rose color; flesh white, crisp and pungent; the roots grow 4 to 5 inches long and 2 inches thick. 335A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

LONG BLACK SPANISH—One of the largest, latest as well as the hardest of radishes. Roots of medium size, oblong, black, and flesh is of firm texture. 336A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

ROUND BLACK SPANISH—Roots round, sometimes top-shaped, 3 to 4 inches in diameter; skin black; flesh white. Fine for winter use, as the roots keep a long time. 337A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

CALIFORNIA MAMMOTH WHITE WINTER—The large white roots grow 10 to 12 inches long, and 3 to 4 inches in diameter at the shoulder; tapering regularly to the tip; flesh crisp, firm and decidedly pungent. 338A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

SELECTED FRENCH BREAKFAST—A very fine radish of the oblong type, scarlet in color, with a white tip; very much in demand, owing to its attractive appearance. It matures very quickly, is sweet, crisp, solid and tender; a fine table variety, and has a very ready sale on the market. 326A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

Long Summer Varieties

CINCINNATI MARKET (The Glass)—An improved strain of Long Scarlet, being slightly larger and with a very small top, roots 6 to 7 inches long, scarlet colored; flesh white, almost transparent, brittle and crisp. 327A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

K-H ICICLE—The leading long white radish and one of the earliest; roots square shouldered than Lady



K-H Icicle Radish. 328A



White Tip. 322A

RAPE True Dwarf Essex Rape

TRUE DWARF ESSEX RAPE—Of great commercial value as a forage for stock and poultry. It will thrive on almost all soils except light sandy and stiff clays, or where most of our common vegetables will succeed. For summer crops, seed should be sown in May; but for late fall crops, sowings should be made in June and July. The best results are obtained if sown in drills about thirty inches apart to allow for horse cultivation. Seed may also be sown broadcast, but only when weather is moist enough that the soil will not dry too deep. Dwarf Essex Rape is usually ready for cutting in eight to ten weeks time from seeding, and it is advisable to cut for cattle rather than turn them into a field; poultry may be turned into it to feed as soon as it has made sufficient growth. An exceptionally fine green feed for sheep and hogs.

340A—(Postpaid) ¼ lb. 10 cts.; 1 lb. 25 cts. By Freight or Express—25 lbs. \$3.00; 50 lbs. \$5.50; 100 lbs. \$11.00.

Rhubarb or Pie Plant

K-H MYATT'S LINNEUS GIANT—Early and very fine; leaves and stalks of immense size.

349A—Pkt. 5 cts.; oz. 30 cts.

MYATT'S VICTORIA—Later than Linneus, but equally large and desirable.

343A—Pkt. 5 cts.; oz. 15 cts.

Salsify or Oyster Plant

A most delicious vegetable. It is used stewed, boiled or fried, and sometimes as a salad. When cooked it has an oyster flavor. Cultivation the same as for carrots or parsnips. One ounce of seed will sow 5 feet of row.

K-H MAMMOTH SANDWICH ISLANDSALSIFY—Large roots.

348A—Pkt. 5 cts.; oz. 30 cts.

LONG WHITE FRENCH SALSIFY—Delicious when cooked.

349A—5 cts.; oz. 30 cts.

SPINACH

Spinach can only be successfully raised on rich soil. It's a foliage plant like Cabbage, Kale or Cauliflower, and needs the richest of soil to produce good plants. Spinach grows very slowly on poor soil and consequently is very inferior. Spinach seed sown in rich land grows quickly, is very rich in color and deliciously tender. If your garden soil is poor, it can be put into condition for raising Spinach and other leaf plants by an occasional application of a fertilizer rich in ammonia.

K-H BLOOMSDALE SAVOY LEAVED (Norfolk Savoy)—Very early and hardy, and one of the best for market and canning. Plant of upright growth with a tendency to go quickly to seed in hot weather. Stems three inches long. Leaves of medium size, the lower ones rounded while the upper leaves become pointed, more or less crumpled and blistered; color, glossy deep green.

350A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

GIANT VICTORIA—Makes a dense, flat rosette with very short stems. Leaves are very large, thick and much wrinkled, blunt or rounded and dark green in color. Stands in weather well and is exceedingly slow to shoot to seed. 351A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

NEW ZEALAND—Entirely distinct from the true Spinach; plant tall and spreading with numerous side shoots; leaves medium green, rather small and pointed; grows well in hot weather and under adverse conditions. 352A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

K-H PRICKLY WINTER—A long sending late maturing sort; plant very large, vigorous and hardy; leaves round, thick, medium sized and dark green. 353A—Pkt. 5 cts.; oz. 10 cts.; ¼ lb. 30 cts.

SQUASH Winter Varieties

K-H CHICAGO WARTED HUBBARD—A perfect dark green and very warty selection from the well-known Hubbard, retaining all the good qualities of its parent. Very handsome, a good keeper and sells at sight.

360A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 60 cts.; 1 lb. \$2.00.

FORDHOOK—squashes are small and cream color, flesh is dry, sweet and one of the best in quality. Keeps throughout the winter.

361A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.; 1 lb. \$1.60.

K-H DELICIOUS—For table use no squash compares with it in its remarkable compactness of grain, dryness, sweetness and exceedingly rich flavor. Its color is almost uniformly green in shade.

362A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 60 cts.; 1 lb. \$2.00.

PIKE'S PEAK or SIBLEY—Large oval fruits tapering at the blossom end; skin smooth and dark olive-green in color; flesh golden-yellow and of very best quality; a winter sort, maturing with Hubbard.

363A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 60 cts.; 1 lb. \$2.00.

K-H BOSTON MARROW—A popular variety with large oval fruit. Skin bright reddish-orange with light cream netting. Flesh orange; fine grained and of excellent quality. This is the most popular variety for canning.

364A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.; 1 lb. \$1.50.

GOLDEN HUBBARD—An exceptionally attractive variety of the true Hubbard type. At maturity the color is red and the flesh is bright orange. The vine is productive and the fruit is fit for use earlier than the Hubbard.

365A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.; 1 lb. \$1.50.

VEGETABLE MARROW—An English variety for summer and fall use; grows about nine inches long and a perfect oblong in form; shell pale yellow, flesh white.

368A—Pkt. 5 cts.; oz. 20 cts.

Summer Varieties

YELLOW SUMMER CROOK NECK—Shaped like a club with a bent neck. The skin is very rough and warted, of an orange-yellow color. Much preferred by the cook on account of its very dry meat when boiled. This is a variety with a running vine.

369A—Pkt. 5 cts.; oz. 20 cts.; ¼ lb. 60 cts.

SQUASH K-H New Sweet Potato Squash

Delicious Novelty Squash—A Long Keeper—The smallest but most delicious squash. We wish we could persuade every one of our customers to purchase a packet of this wonderful new squash, because we know that every one that grows it will be delighted with it. It will be the gem of the garden during the 1920 growing season. This little squash grows about 6 to 8 inches long and is about 6 inches around. The plants are inclined to be bushy rather than trailing, and bear quite a large number of fruits, which are distinctly ornamental owing to the variety of coloring of the skin which is rich yellow, prettily marked with deep red and green. The flesh is unlike that of any other squash, being decidedly superior in every way. It has the flavor of the sweet potato, but is a little sweeter and has a golden colored flesh. The seed cavity is unusually small, so there is practically no waste. One advantage about this little squash is the fact that it meets the requirements of families of all size. With the old type of squash, there is usually quite a lot of waste, due to the fact that the fruits are too large for the family consumption; one meal. Our long keeper Sweet Potato squash can be made to meet the requirements of any sized family without an ounce of waste, by simply serving just the number of fruits needed; usually one of our squash will be found sufficient for two persons. We feel real pride in being able to offer this novelty to our customers, because it has real merit and will give satisfaction everywhere. It is weeks earlier than any other squash, and can be harvested long before the early frost. A keeper it has no equal. Fruits carried over from 1918 harvest in fine condition in the spring of 1919. Our seed of this squash is limited. Get your order in early. Don't miss this opportunity to get something that is unusually good and will be a real treat for the entire family. 366A—Pkt. 10 cts.; oz. 30 cts.

Myatt's Victoria Rhubarb 343A

K-H Mammoth Sandwich Island Salsify. 348A



A K-H Novelty The New SWEET POTATO SQUASH

The gem of the garden. A delicious flavor. An economical food. Grows 6 to 8 inches long and about 6 inches in circumference. Split them in the middle, clean out the seed cavity, put in a strip of bacon or a piece of fresh pork, tie the halves together and bake. There is nothing finer on the market. For full description, see page preceding but be sure to include K-H New Sweet Potato Squash in your order.

366A—Pkt. 10 cts.; oz. 30 cts.

SUNFLOWER

MAMMOTH RUSSIAN SUNFLOWER—The giant of all Sunflowers. Single heads measure 12 to 22 inches in diameter and contain an immense quantity of seed which is highly valued by all farmers and poultry breeders who have tried it as an excellent and cheap food for fowls. They eat it greedily, fatten well on it, and attain a bright, lustrous plumage and strong, healthy condition better than on almost any other food. It is the

best egg-producing food known for poultry. Every farmer should plant some of the seed in any waste piece of ground, any time from early spring up to the middle of July. It is a wonderful improvement on the old native Sunflower, and besides the great value of the seed as a poultry and stock food, its leaves make a fine fodder, while its strong thick stalks can be used as fuel. Four quarts of seed will plant one acre. The seed is also recommended as a food for horses.

375A— $\frac{1}{4}$ lb. 10 cts.; 1 lb. 30 cts.

CONNECTICUT SEED LEAF TOBACCO — A popular sort used for cigar wrappers and home use. 377A—Pkt. 5 cts.

FINE HAVANA TOBACCO—Finest strain of imported seed. 378A—Pkt. 5 cts.

TOBACCOS

TOMATOES

The Best Varieties

K-H BONNY BEST — One of the finest bright red sorts for growing in greenhouses, and a good one to follow Earliana in the open field. It has been highly recommended by U. S. Department of Agriculture as well as by big growers and shippers throughout the country. Tomato of medium size; color, smooth and remarkably uniform in size and shape. A splendid variety for market and shipping. 380A—Pkt. 5 cts.; oz. 45 cts.

SPARK'S EARLIANA—Very early and of large size. Color a beautiful red, handsome, uniform, remarkably solid and productive. 381A—Pkt. 5 cts.; oz. 45 cts.

CHALK'S EARLY JEWEL—One of the very best early tomatoes yet introduced. The vines are vigorous and very productive. The fruits are bright deep scarlet-red, nearly round or somewhat flattened, smooth, of large size and most excellent quality. They ripen very early and the pickings continue through a long season. It is a most desirable sort for the home garden. 382A—Pkt. 5 cts.; oz. 35 cts.

CRIMSON CUSHION (Beefsteak)—The largest of the bright red tomatoes; really a red Ponderosa. 383A—Pkt. 5 cts.; oz. 35 cts.

K-H NEW STONE—Recognized as one of the best of all standard sorts. It is the largest bright red, perfectly smooth, highest yielding, best keeping, finest flavored main crop tomato in existence. 384A—Pkt. 5 cts.; oz. 35 cts.

DWARF CHAMPION—This is sometimes sold as the "Tree Tomato". It is a second early or main crop, purplish pink variety, especially desirable where garden space is limited. The vines are about two feet high, vigorous, upright and compact. The fruits are medium sized, exceptionally smooth and of very good quality.

A superior strain with more even, smoother fruit than the original.

385A—Pkt. 5 cts.; oz. 35 cts.

TOMATOES—The greatest success is attained by clipping the superfluous branches and leaves. It seems that most Tomato growers over-feed their plants, causing them to develop a lot of rank growth, thus diminishing the fruit production. A nice medium rich sandy soil is best. The ripening of Tomatoes can be hastened if careful attention is given to pruning of the vines. When the plants are six to eight inches tall, they will begin to throw out branches. Select the largest and healthiest of these and pinch off all others except this one and the main stem. Take care not to pinch off the fruiting branches which, as they appear, can be distinguished by the buds which form very early. Tomatoes always do best when tied to stakes; the stakes should be strong and not less than five to six feet tall. Keep off all side shoots by going over the plants at frequent intervals. This will insure sufficient sunlight reaching the fruit to hasten ripening. Tomatoes, however, should not be entirely exposed to the hot sun's rays, as this very frequently scorches and ruins the fruit. The ripening of Tomatoes can be hastened by one or two applications of a good commercial fertilizer, with an analysis of about 8 to 10 per cent of Acid Phosphate and 6 to 8 per cent Potash.

Bonny Best is a favorite tomato of medium size; color, bright scarlet; always smooth and remarkably uniform in size and shape. A shipping.



K-H Bonny Best Tomato. 380A

GOLDEN QUEEN—A handsome yellow variety, of medium size and excellent flavor. Very attractive when sliced with the red sorts. 388A—Pkt. 5 cts.; oz. 40 cts.

ROYAL PURPLE—An improved type of Beauty and more productive; fruits exceedingly smooth and uniformly large in size, round, and with little core; color deep pink, tinged with purple; a mid-season sort. 389A—Pkt. 5 cts.; oz. 35 cts.



Ponderosa—The Old and Well Known Favorite. 390A

K-H JOHN BAER—This new exceptionally early tomato has won much praise from all who have tried it. It is very large, free from core and of an attractive bright red color. Very prolific, one plant often having from 50 to 75 fruits which are borne in clusters and ripen evenly clear up to the stem; never bursts. Unexcelled for early home or market use.

386A—Pkt. 5 cts.; oz. 50 cts.

MATCHLESS—This great tomato is well named. It is a strong, vigorous grower with thrifty vines which produce large, handsome tomatoes most abundantly throughout the season. The fruits, of a rich cardinal-red, are remarkably solid and smooth, free from core and uniformly of the finest flavor. The tomatoes are always of the largest size; they do not become smaller even late in the season, as the healthy growth of vine and foliage carries magnificent crops until killed by frost. A favorite main crop variety in many sections.

387A—Pkt. 5 cts.; oz. 40 cts.

PONDEROSA—This is the largest fruited tomato and is of a fine quality for slicing. The vines are of strong growth; fruits oblong in form, deep through, and generally ridged or ribbed purple in color. They are solidly fleshy with small seed cells; of fine flavor. Planted in good soil, fruits frequently attain a weight of one pound or more.

390A—Pkt. 5 cts.; oz. 50 cts.

TURNIPS

LARGE WHITE GLOBE—One of the most productive kinds and in good rich soil the roots will frequently grow to 12 pounds in weight. The roots are globe-shaped or slightly flattened; skin very white and smooth. This sort is used for stock feeding and is also good for table use if pulled when the roots are not more than 4 to 5 inches in diameter. Where the winters are mild the tops are used for greens.

410A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

PURPLE TOP, STRAP-LEAVED—The most popular sort. A general favorite with all, and more largely grown than any other turnip; will do well to sow broadcast or in drills, and will form good sized bulbs in seven or eight weeks. Rather flat and of medium size. Color, purple above ground, white below; flesh white, fine grained and tender.

411A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

EARLY WHITE FLAT DUTCH, STRAP-LEAVED—A very early, white turnip, extensively used for the table, especially in the southern states. The leaves are entire, toothed on the margin but not divided or lobed, and are upright in growth. The roots are of medium size, flat, very white fleshed, fine grained and sweet. The roots when in best condition for table use are about two and one-half inches in diameter. This variety is also grown as a field crop. 412A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

PURPLE TOP WHITE GLOBE—This excellent table variety is globular in shape, of good size and very attractive appearance. The roots are large, purple or dark red above ground, white below. The flesh is white, fine grained and tender. The roots when in best condition for table use are about three inches in diameter, but can be grown much larger for stock feeding. This variety keeps well for so early a variety and is one of the best for market use. It is also known as Red Top White Globe.

413A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

GOLDEN BALL or ORANGE JELLY—One of the most delicious and sweetest yellow-fleshed turnips. Not of large size, but firm, hard and excellent flavor. Keeps well and is superior as a table variety.

414A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.



Purple Top, Strap Leaf. 411A

TOMATOES—(Cont'd)

JUNE PINK—One of the earliest varieties of tomato and a special favorite with those who like the pink color. The fruit is borne in clusters and begins to ripen very early. The tomatoes average three inches in diameter and are of excellent quality. The yield is heavy and continues until the vines are cut down by frost.

391A—Pkt. 5 cts.; oz. 40 cts.

DWARF STONE—The vines are dwarf but vigorous and productive. Although an intermediate or rather late maturing variety, the fruits are of good color, being an attractive bright red, exceedingly smooth and very solid. It is a desirable sort for the home garden. We consider this the best of the large fruited dwarf tomatoes.

392A—Pkt. 5 cts.; oz. 40 cts.

Small Fruited Varieties for Preserves

YELLOW HUSK—Also called Strawberry and Ground Cherry. Is greatly valued for use as a preserve; it also makes delicious pies either when ripe or dried with sugar. The fruits are half an inch in diameter and of very sweet and agreeable flavor. They are enclosed in a husk or calyx. We consider the Yellow Husk better than the Purple Husk variety.

395A—Pkt. 5 cts.; oz. 50 cts.

PEACH—These are excellent for eating raw. The fruit resembles a peach, even to the skin which is covered with a slight bloom as in a peach or nectarine.

396A—Pkt. 5 cts.

RED CHERRY—Identical with the Yellow Cherry except in color of fruit, which is of a light scarlet.

397A—Pkt. 5 cts.

RED PEAR—Fruit pear-shaped; of bright scarlet color; rich flavor.

398A—Pkt. 5 cts.

YELLOW CHERRY—Fruits are of a light lemon-yellow color; rich flavor.

399A—Pkt. 5 cts.

YELLOW PEAR—Similar to the Red Pear, but a handsome yellow color.

400A—Pkt. 5 cts.

YELLOW PLUM—Fruits are yellow, plum-shaped in clusters. Excellent.

401A—Pkt. 5 cts.

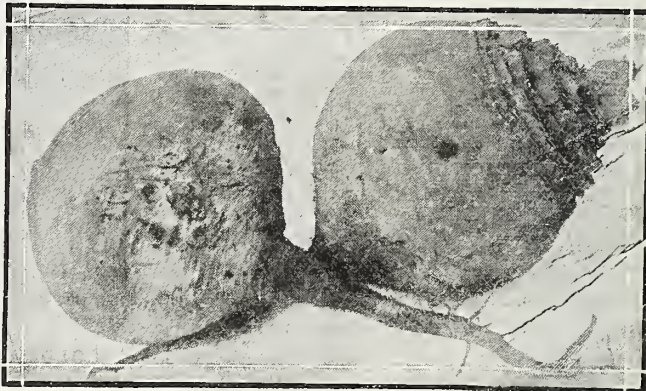
RUTABAGA

AMERICAN PURPLE TOP—This strain is of American origin and is a purple top, yellow variety. It has been selected to produce a smaller top and a shorter neck than is usually found; the roots grow to a large size and are of the finest quality and excellent both for the table and for stock feeding.

317A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

LARGE WHITE SWEET—Excellent keeper. Desirable for table and stock. Roots large, globe-shaped, small neck, color white. Flesh white, firm and sweet.

318A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.



American Purple Top Ruta Baga. 317A

SNOWBALL or EARLY SIX WEEKS—The most perfect in outline and the best white garden turnip grown. In shape it is round, of exquisite flavor, with single tap root, and very distinct small top.

415A—Pkt. 5 cts.; oz. 15 cts.; ¼ lb. 45 cts.

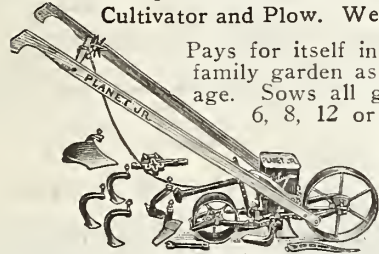


PLANET JR. GARDEN TOOLS



You can not afford to till the ground without Planet Jr. tools. They not only save hard labor, but they enable you to cultivate double the acreage in the same time, and thus add over 100 per cent to your crop yield. Invented by a practical farmer and manufacturer—the result of fifty years' experience. Strong, lasting construction. Fully guaranteed.

No. 4 Planet Jr. Hill and Drill Seeder, Single Wheel Hoe, Cultivator and Plow. Weight 50 lbs. Price \$19.50



Pays for itself in a single season in the family garden as well as in larger acreage. Sows all garden seeds in hills 4, 6, 8, 12 or 24 inches apart or in drills in straight, even rows, at a uniform depth. Easily changed to a single wheel hoe that hoes, cultivates and plows easily and thoroughly, all through the season.

NO. 4-D As a SEEDER ONLY \$15.50.

No. 25 Planet Jr. Hill and Drill Seeder, Single and Double Wheel Hoe, Cultivator and Plow. Weight 61 lbs. Price \$23.00



This is a splendid combination for the family garden, onion grower or large scale gardener. As a seeder it is the same as the No. 4 and does the same accurate work. Can be used as a double wheel hoe to

straddle the row till crops are 20 inches high then as a single wheel hoe to run between rows. Hoes work close without injuring plants; cultivator teeth and plows do thorough work. Cutting tools specially hardened giving long service. Two acres a day can easily be worked with this tool.

No. 31 Planet Jr. Drill Seeder and Single Wheel Hoe. Weight 32 lbs. Price \$13.00

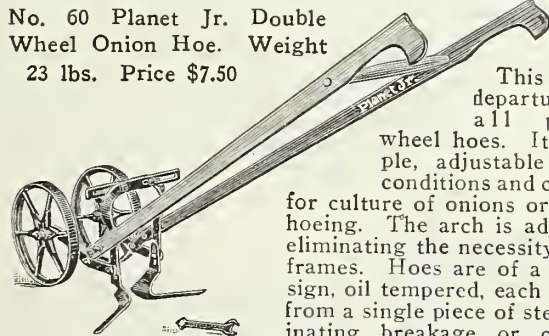
This tool is of great value to thousands of gardeners who have never felt able to own a seed drill or a wheel hoe.

It will sow even a small packet of seed with great precision, in a narrow row from 1/4 to 2 inches deep. Quickly changed to a first class wheel hoe.

No. 31-D
As a Seeder
only \$10.50



No. 60 Planet Jr. Double Wheel Onion Hoe. Weight 23 lbs. Price \$7.50



This tool is a departure from all previous wheel hoes. It is simple, adjustable for all conditions and complete for culture of onions or general hoeing. The arch is adjustable, eliminating the necessity of tool frames. Hoes are of a new design, oil tempered, each stamped from a single piece of steel, eliminating breakage or clogging.

Experience has proven the six inch hoes to be the most consistent and efficient soil mulchers and weed killers of all attachments now in use. A favorite among onion growers and market gardeners.

No. 12 Planet Jr. Double and Single Wheel Hoe, Cultivator and Plow. Weight 33 lbs. Price \$12.50

14-inch Steel
Wheels
Steel Frame



Straddles crops until 20 inches high, then works between rows with one or two wheels. The plows open furrows and cover them. The cultivator teeth work deep or shallow. Hoes are wonderful weed killers and mulchers. The greatest hand cultivating tool made for the average garden.

No. 16 Single Wheel Hoe, Cultivator and Plow. Weight 26 lbs. Price \$10.50

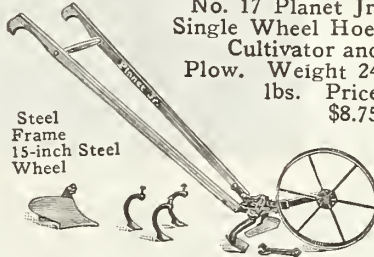
The highest type of single wheel hoes made. Light and durable—can be used by man, woman or boy. Will do all the cultivation in your garden in the easiest, quickest and best way. Strong, indestructible steel frame. High, easy-running steel wheel with forged steel spokes.



Steel
Frame
15-inch Steel
Wheel

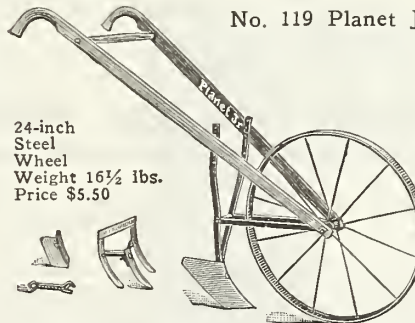
No. 17 Planet Jr. Single Wheel Hoe, Cultivator and Plow. Weight 24 lbs. Price \$8.75

Steel
Frame
15-inch Steel
Wheel



The frames, handles and wheel are the same but the attachments vary. They take the drudgery out of garden work and give bigger, better crops. Last a life time.

No. 119 Planet Jr. Garden Plow



24-inch
Steel
Wheel
Weight 16 1/2 lbs.
Price \$5.50

A tool that will appeal to those who prefer a high wheel tool for their garden work. Where the soil has not been so thoroughly and carefully prepared, the high wheel undoubtedly makes an easy running tool.

The equipment is so complete that it will meet all the needs of the ordinary garden, where adjustments and refinements of the higher priced wheel hoes are not required.

CROP ROTATION IN THE GARDEN—Expert agriculturists are continually advising crop rotation. They cannot advise it too strongly. We all know how very necessary crop rotation is to insure continued successful cropping. Crop rotation in the garden is just as necessary as upon the farm. The continued planting of the same crop upon the same patch is a decidedly risky operation. Peas and Beans are valuable nitrogen-gathering plants and should be planted in rotation with Carrots, Beets, Lettuce, etc. By careful system of rotating, objectionable fungicides can be destroyed which otherwise would live in the soil indefinitely. Rotation is about the only way to rid the Tomato patch of dry rot; or Beans of Anthracnose.

Some
Essentials

FOR THE LAWN

And Lawn
Grass Seed

How to Make a Beautiful Lawn

First. Soil conditions must be right. The best soil for a lawn is a good loam, not too heavy or too light. It cannot, however, be too rich. Good drainage is necessary.

Grass seed sown on light sandy soil always burns up during the tropical months of July and August as there is not sufficient humus in the soil to maintain moisture. Grass will not thrive on soil deficient in humus.

Never use fresh manure on a lawn. The risk of ruining your lawn is too great. Fresh manure always contains lots of weed seeds. Use well rotted and if possible sifted manure. If this kind of manure is not obtainable give your lawn a good top dressing of commercial fertilizer, rich in ammonia and phosphate.

Grass will not thrive on soil that is too acid. Give your lawn a good top dressing of limestone dust. Use 100 lbs. to each 1000 sq. ft. This will get rid of the acid and leave your soil in healthy condition. Always be sure to apply limestone before top dressing with fertilizer. A week or two before is best.

Earth worm casts and mounds are an annoyance to most lawn owners. The worms can be gotten rid of by the use of the following formula. Dissolve 1 oz. of Bichloride of Mercury and 1 oz. of salt in 50 gallons of water. Apply liberally and wash in with plenty of water. The worms will quickly come to the surface where they can be collected and destroyed.

Do not allow your grass to grow too long. Keep the mower busy in the spring. When your grass is kept cut it encourages the development of new roots. Just the thing needed to insure a good sod.

Many a good lawn is destroyed by too little attention to watering. Instead of the usual sprinkle every day, thoroughly soak the grass once or twice a week so that the water reaches to the subsoil. In this way the grass roots are encouraged to go down deep into the soil and are better able to withstand the hot summer sun and is less likely to scorch. Mere sprinkling encourages the young grass roots to develop near the surface where they become exposed to the hot sun's rays which scorch and destroy them.

To maintain a nice even surface a lawn should be rolled several

times during the early spring while the soil is workable. Never, however, use the roller when the soil sticks to it.

The successes of some, and the failures of others in the production of beautiful lawns, are not accidental. A satisfactory lawn is the result of knowledge and care. The two vital accompaniments of lawn success are right soil conditions; and right seed for the soil. Many people ignore the soil condition; others experiment with seed.

Lawn Grass Seed Required

Amateurs are often puzzled about the amount of lawn grass seed to sow. The following may be taken as a general rule for new seedings, but when old lawns are being renovated only about half the amount stated will be needed: For 300 sq. ft. equalling a plot 15ft.x20ft., 1 pound; for 2,000 sq. ft. equalling a plot 40ft.x50ft., 7 pounds.



A Beautiful Lawn Increases the Value of a Home

Lawn Service Department

Our Lawn Service Department is equipped to take care of all your lawn troubles; the head of this department has been advising on lawns for the past twenty years. If your lawn fails to produce grass abundantly; or if it is patchy, or develops a mossy surface; write us about it, we may be able to help you. Let us know something about your soil; often special grasses are necessary to insure a good lawn. We are in line to tell you all about the special grasses. If you will send us a sample of your soil, we will test it and advise you how to proceed. Quite a multitude of little lawn troubles develop during the season; pass them on to us and we will give you the benefit of our long experience along this line. Don't hesitate to write; it's a pleasure to answer inquiries of all kinds.

GRASSES ADAPTED TO LAWN MAKING

It is evident that not all grasses are adapted to lawn making. Only such kinds as are capable of making a close turf are ideal for lawns. Most grasses which have creeping rootstocks, short joints, and produce long, narrow leaves in abundance about the crown of the plant adapt themselves well to lawn making. Besides this, a desirable lawn grass possesses a pleasing color, which does not change decidedly from season to season, is drought resistant, responds quickly to a change of conditions from winter to spring, and bears repeated clippings with the lawn mower. Our K-H EXCELSIOR Lawn Grass Mixture contains just such grasses.

K-H Excelsior Lawn Grass Mixture

A specially blended mixture of grasses for making or renovating lawns.

We don't hesitate to say that, no matter what price you may pay, you cannot possibly secure a more dependable mixture of Lawn Grass than we are offering our customers.

This mixture is made up of only those Grasses which, after many years of experience, we know to be best for the making of good well-wearing lawns. The Grasses are so blended as to insure a nice close uniform growth of fine grass with an abundance of root growth to insure a good sod in the shortest time. It is also so blended that it will insure a good growth of grass either in the open or under trees.

We positively guarantee this mixture to give entire satisfaction, subject to soil and other conditions being favorable.

Price, per lb., 40 cts; 5 lbs., 1.50; 10 lbs., \$3.00; 20 lbs., \$5.75.

White Dutch Clover

White Dutch Clover is the only clover that can be used for mixing with lawn grass, and is very extensively used for this purpose. On soils inclined to be damp it thrives remarkably well. It is of dwarf habit, growing only six inches high; produces a multitude of dainty little sweet smelling blooms, from which bees delight to extract their honey. White Dutch Clover, being one of our leading legumes, helps to keep the lawn soil in good condition. Three pounds of White Dutch Clover will successfully seed down one acre; one-fourth pound is usually sufficient to mix with the grass seed for an ordinary lawn.

Price, ¼ lb., 25 cts.; 1 lb., 75 cts.

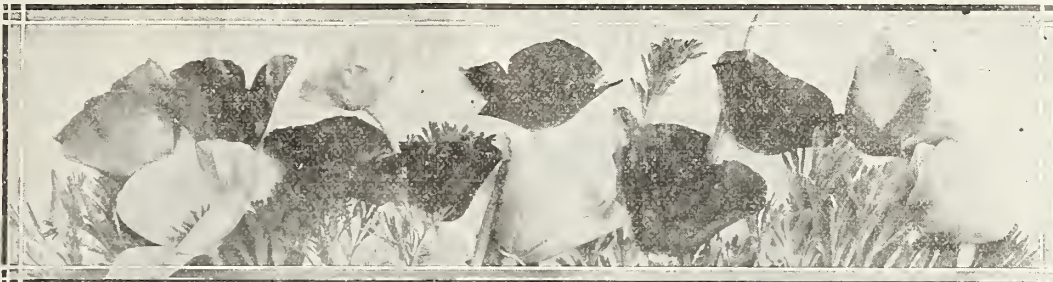
K-H Newlawn Fertilizer

K-H NEWLAWN FERTILIZER—Lawns are continually becoming run out or patchy because there is not sufficient plant food in the soil to keep the young grasses thrifty; or, because the soil does not contain the necessary properly balanced plant food. By the use of K-H NEWLAWN FERTILIZER it is possible to so feed the young growing grasses as to insure a good strong, thrifty growth.

This fertilizer is high in phosphate, the element of plant food so desirable to the healthy production of grasses everywhere. A lawn can be kept in a high state of healthy productiveness by an occasional top dressing of K-H NEWLAWN FERTILIZER.

Price. (By express or freight)—100 pounds, \$4.00; 200 pounds, \$7.50.

Our Flower
Seed List
Includes only
The Popular
Varieties, or
Old Favorites.
None Listed
but Those
Suited to
This Territory.



FLOWER SEED DEPARTMENT



Old-fashioned Snapdragon.

ANTIRRHINUM (Snapdragon)—This fine old-fashioned flower is again becoming very popular. It has been greatly improved in recent years. As a bedding plant it blooms continuously until late in the fall. The long spikes of brilliantly colored flowers are deservedly popular for cut flowers. Grows 2 to 3 feet high. Sown in early spring, it blooms freely the first season. Mixed, all colors. 500A—Pkt. 5 cts.

AGERATUM; LITTLE DORRIT—the pretty, bush-like flowers of the Ageratum are produced in clusters constantly all through the summer. The plant has a neat, bushy habit. Excellent for bedding or for bouquets. Seeds may be started in a mellow seedbed in the open ground, or under glass in the early part of the season. Color azure-blue; free-flowering. 501A—Pkt. 5 cts.

SWEET ALYSSUM (Carpet of Snow)—Small white flowers, delicately fragrant, valuable for cutting and for bedding. Sow in early spring or even the previous autumn. In the border the plant is covered with bloom the entire season. For winter bloom, sow the last of August, thinning to about a dozen plants for a good-sized pot or basket. When out of bloom, cut back for a second crop of flowers. Dwarf, compact. Not over six inches high. Covered with fragrant white flowers the entire summer. 503A—Pkt. 5 cts.

AFRICAN DAISY (New Hybrids)—The

blooms of these New Hybrids of the Golden Orange African Daisy (*Dimorphotheca Aurantiaca*) comprise a wonderful variety of beautiful and delicate shades of color, ranging from pure white through pale salmon and primrose tones to deepest orange. The flowers are very graceful and are produced in the greatest profusion all summer. A bed of the New Hybrid African Daisy makes a continuous and charming display of color. 504A—Pkt. 10 cts.

COSMOS; K-H EXTRA EARLY FLOWERING—A pretty feathery foliaged annual, useful for cutting, growing sometimes to a height of four feet and very effective right up to the frost. Makes a nice winter flowering pot plant if sown in summer. Colors include purple, pink, mauve, white and rose. Height 3 to 4 feet. 520A—Pkt. 5 cts.

COREOPSIS LANCEOLATA GRANDIFLORA—A most popular hardy plant. Flowers are rich golden-yellow in color, graceful and invaluable for cutting. Blooms very abundantly during the last of June and continues in flower during the entire summer and autumn. Height, 18 to 24 inches. 522A—Pkt. 5 cts.

K-H EXHIBITION ASTERS—A selected mixture of the best varieties for the most critical gardeners, which contains all of the various types, together with almost every color of value; thus enabling the purchaser to procure the finest assortment of kinds and colors in a single package. 505A—TALL VARIETIES MIXED—10 cts.

506A—DWARF VARIETIES MIXED—Pkt. 10 cts.

BALSAM (Lady Slipper) **CAMELLIA FLOWERED MIXED**—Plants of pyramidal growth bearing rose-like flowers which cover the whole plant; flowers profusely all summer. In soil well fertilized, excellent results will be obtained. Height two feet. 510A—Pkt. 5 cts.

BACHELOR'S BUTTON—(Corn Flower; Ragged Sailor, etc.)—One of our best known hardy annuals. Blooms freely and is easily grown. Eighteen to twenty-four inches in height. Finest mixture of colors. 511A—Pkt. 5 cts.

CALLIOPSIS DRUMMONDII—GOLDEN WAVE—Plants bushy, compact, covered with rich golden-yellow flowers, chestnut-brown center. 512A—Pkt. 5 cts.

CALIFORNIA POPPY—The brilliant *Eschscholtzia* is California's chosen State flower. The plants grow to about one foot in height; the leaves are of a grayish green color, finely cut and divided. The large, handsome flowers, two inches or more in diameter, are produced in great profusion all summer. Seeds should be sown where the plants are to bloom. 515A—Pkt. 5 cts.

CANDYTUFT; EMPRESS—Large spikes of the purest white and of erect habit; dwarf and compact; very profuse in bloom; exceedingly showy and effective. 516A—Pkt. 5 cts.

CHINESE WOOLFLOWER (*Celosia Childsii*)—Without doubt the new *Celosia*

is the most magnificent garden annual yet introduced. Its ease of culture and long continued blooming season, July until frost, together with its massive bunches of wool-like flowers and glowing color, combine to make it the most odd as well as the choicest novelty for the general flower garden. Plants grow about three feet high, the bloom starting early with a globular central head of immense size, while numerous branches are sent out, each bearing a ball of scarlet wool, while each branch produces many laterals which also develop excellent heads of bloom that last until killed by frost, and expand with a deepening richness of color to a deep crimson-scarlet. Seed may be sown in the open ground after danger from frost, or may be sown in pots and transplanted when ground is ready. 517A—Pkt. 10 cts.

CARNATION; MARGUERITE—Like the winter blooming Carnations, but bloom the first year from seed. A great variety of beautiful shades and fragrant double flowers. Seeds should be sown inside to give longer season of bloom. Plants can be taken up in pots for winter blooming. 523A—Pkt. 10 cts.

CHRYSANTHEMUM; ANNUAL MIXED—Plants of easy cultivation, very showy and excellent for cutting, flowering from June until frost. One of the most satisfactory hardy annuals for summer blooming. 518A—Pkt. 5 cts.



Lady Slipper (Balsam). 510A.

Rapid Growing Climbing Vines

BALLOON VINE (*Cardiospermum*) (Love in a Puff)—A rapid-growing summer climber, with small white flowers, followed by curious inflated seed pods.

525A—Pkt. 5 cts.

CANARY BIRD VINE—Rapid climber, of easy cultivation; flowering continually all summer; flowers of a bright canary-yellow.

526A—Pkt. 5 cts.

CYPRESS VINE—Rapid climber, having dark green feathery foliage, bearing an abundance of star-like flowers. Fine for trellises.

527A—Pkt. 5 cts.

CATHEDRAL BELLS—Another beautiful annual climber of rapid growth, with fine foliage; flowers bell-shaped, almost 1½ inches across and 2 inches long. In good soil the stems often grow 20 to 30 feet long and cover a large surface. Plants begin flowering when quite young. Put the seed in barely moist earth, edge down, and barely cover with light soil. Do not water until the plants appear, unless the soil is very dry.

528A—Pkt. 10 cts.

CLIMBING JAPANESE HOP—Of rapid growth. Foliage very dense, similar in shape to the common Hop. Very seldom affected by insects or extreme heat, retaining its foliage until frost. Fine for covering verandas and trellises, attaining a height of 12 feet.

529A—Pkt. 5 cts.

CARDINAL CLIMBER—The most beautiful and brilliant annual climber ever sent out. It is a strong and rapid grower, attaining a height of 30 feet or more, with beautiful fern-like lacinated foliage and literally covered with a blaze of circular fiery cardinal-red flowers from mid-summer until frost. The flowers are about 1½ inches in diameter and are borne in clusters of 5 to 7 blooms each. Like other Ipomoeas, it delights in a warm, sunny situation and good soil. The seed may be started indoors in March or April, but it is best to wait until the weather gets warm and settled, and then sow out of doors. In either case it is well to file or cut through the hard outer shell of the seed, or steep in warm water until they begin to swell, which greatly assists in a free and quick germination. If sown in cold, wet ground the seed is liable to rot—and not grow.

530A—Pkt. 10 cts.

FLOWERS—(Continued)



K-H Exhibition Asters (Mixed). 505-6A



Sweet Alyssum (Little Gem). 503A

GYPSOPHILA (Baby's Breath)—Very easily grown annual, 12 to 15 inches. The flowers are pure white, very small, star-like, and produced in feathery sprays.

542A—Pkt. 5 cts.

KOCHIA (Summer Cypress)—A highly ornamental annual of unusually rapid growth, which forms regular pyramids from 2 to 3 feet in height, having a cypress-like appearance. The leaves are slender and of a light peagreen color until September, when they change to a carmine and blood-red. Its bright autumn coloring has given it two other names: "Mexican Fire Plant" and "Burning Bush." This plant does exceedingly well in the West from seed sown in the open. It has a beautiful and striking appearance right up until snow falls.

543A—Pkt. 5 cts.

MARIGOLD: DWARF FRENCH SINGLE (Legion of Honor) (Little Brownie)—Grows quite regular and only about one foot high, and blooms in abundance from July until cut down by the frost. The single flowers are of a lovely golden-yellow, with a broad velvety blotch on each petal; of easy culture.

544A—Pkt. 5 cts.

MYOSOTIS (Forget-Me-Not)—A favorite old-fashioned flower, bearing in profusion, especially in fall and spring, clusters of dainty blue five-petaled blossoms. It thrives well in the shade or open border, but flourishes best in a moist, shady situation.

548A—Pkt. 10 cts.

MOMORDICA BALSAMINA (Balsam Apple)—Remarkably handsome climbing annual with rich green foliage and golden-yellow fruit, shaped like an apple, which when ripe breaks open its brilliant crimson interior.

549A—Pkt. 5 cts.

CHARANTIA BALSAMINA (Balsam Pear)—The fruit of this variety is pear-shaped; otherwise it resembles the Balsam Apple.

550A—Pkt. 5 cts.

GEUM COCCINEUM—A very handsome variety, bearing immense double flowers of bright scarlet; a perpetual bloomer; fine for cutting; two feet high.

552A—Pkt. 5 cts.

MOONFLOWER—The Ipomoeas are climbers of rapid growth. If planted in rich soil in a sunny location and given plenty of water, will grow to a height of 60 to 70 feet in a single summer, and will bear immense fragrant flowers of glistening white 7 to 8 inches across. The flowers open at sunset and close the next morning. To hasten germination, soak the seed in warm water for a few hours.

532A—Pkt. 5 cts.

MORNING GLORIES: IMPERIAL JAPANESE MIXED—Who does not love the Morning Glory? It has long been a favorite for shading porches, covering screens and similar purposes. It is one of the most free-flowering and rapidly growing plants in cultivation. The foliage is a dark green, and the freshness and delicacy of the flowers fully make up for their fugitive character. The prevailing colors are shades of blue, but there are other colors, ranging from white to dark red, and some of the flowers are striped. The seeds germinate so readily that they can be grown in the garden wherever the plants are needed, and almost at any time.

533A—Pkt. 5 cts.

EVERLASTING SWEET PEAS (*Lathyrus Latifolius*)—Handsomeness, free-flowering, hardy climber of great beauty, with clusters of elegant sweet pea-like flowers in great profusion. Grows 6 to 8 feet high. Finest Mixed.

536A—Pkt. 10 cts.

DAISY: SHASTA—A fine hardy perennial, 12 to 18 inches high. The flowers are pure white, with a bright yellow center, average about 4 inches in diameter, and are borne on long, stiff, wiry stems. Valuable for cutting, remaining fresh for two weeks or more.

537A—Pkt. 10 cts.



Candytuft (Empress). 516A



Chinese Woolflower. 517A

FLOWERS (Continued)



Carnation Marguerite. 523A



Coreopsis, Mixed



Old Time Hollyhock. 553A

HOLLYHOCK—Our strain of seed of this old-time favorite is without doubt unsurpassed. The tall, stately spikes bear immense quantities of blooms of the most brilliant colors, both in the single and double varieties. They succeed best in a rich, well-drained soil, requiring slight protection during the winter. Six feet high. Single and double mixed. 553A—Pkt. 10 cts.

NIGELLA (Love in a Mist)—Curious looking flowers with finely cut foliage. Flowers are cornflower blue, well set off by the feathery, green foliage which entirely surrounds them. Very good for bouquets. 560A—Pkt. 5 cts.

NASTURTIUM—Everything considered, we place the Nasturtium at the head of the list of annual flowers. They are so easily grown, require so little care, and produce their cheerful flowers so abundantly throughout the entire season.

K-H EXHIBITION CLIMBING MIXED NASTURTIUM—For trailing over porch lattice or arbors, or for covering old fences or unsightly places, also for vases, we consider the tall varieties most desirable. There is also a greater variety in colors, including the brilliant Lobbianum type. Mixture, including all types. 561A—Pkt. 5 cts.

K-H EXHIBITION DWARF MIXED NASTURTIUM—The dwarf varieties are the most desirable for bedding or for borders, where space is limited. Our mixture contains many of the best varieties. 562A—Pkt. 5 cts.

PANSY: K-H GIANT EXHIBITION MIXTURE—This is a mixture of all the giant-flowered varieties, including both plain color sorts, faced sorts and the new giant ruffled edge and rare varieties. The seed is saved from exhibition flowers. Grow this seed with care, following directions, and you will have the most gorgeous giant pansies imaginable. 565A—Pkt. 10 cts.

PETUNIA: GIANT SINGLE-MIXED—A strain of incomparable beauty, size and luxuriance. Most of the flowers are exquisitely ruffled or fringed on the edges and are of enormous dimensions, 4 to 5 inches across; but their great merit lies in the tremendous variety of colors, markings, veinings, blotches and stripings; in the most grotesque and beautiful combinations, some with charming deep throat of yellow, white, black, green or maroon, running off into intricate veins. Some of the colors are rich and gorgeous and others of lovely, delicate shades. 575A—Pkt. 10 cts.

PHLOX DRUMMONDII: K-H GIANT FLOWERING MIXED—A very pretty hardy annual; invaluable for bedding masses and for cut flowers, from its bright colors, which vary from the purest snow-white to the deepest blood-red, and the unusual length of its blooming season. There is no annual which can compare, for beauty, duration of bloom, brilliancy of colors and usefulness, to the Phlox. 580A—Pkt. 10 cts.

POPPY: K-H SELECTED SHIRLEY (Ghost)—A greatly improved strain of this lovely race of single Poppies, with shining flowers of silky texture, varying in color from pure white and delicate pink to rosy carmine and deep crimson, many of them being beautifully striped and edged with white. The blooms, if cut while young, will keep in water for two or three days. 585A—Pkt. 5 cts.

POPPY: K-H EXCELSIOR MIXTURE—This mixture consists of a combination of the finest single and double flowering Poppies in an endless variety of the most brilliant and delicate colors. When planted in large beds they produce a gorgeous display. 586A—Pkt. 5 cts.

PORTULACA (Rose Moss)—K-H MIXED—Creeping tender annual, six to eight inches high, and bearing glossy, cup-shaped blossoms in very brilliant colors. The seed germinates slowly and should be started under glass or when the weather is hot. These flowers love the sunshine and do best on rather dry ground. Special Mixture. 590A—Pkt. 5 cts.

SALPIGLOSSIS (Painted Tongue): EMPEROR—A half-hardy annual, growing about three feet high and bearing trumpet-shaped blossoms of richest shades and colors. We have a splendid giant-flowered strain; each stem is loaded with these most handsome flowers; each one richly veined with golden color. 593A—Pkt. 5 cts.

POOR MAN'S ORCHID (Butterfly Flower): SCHIZANTHUS RETUSUS—These Schizanthus Retusus have larger flowers than other types, and have longer stems. The flowers are borne farther apart on the stems and look more like an orchid than any outdoor flower. Beautiful for the garden or conservatory. Red orchid-shaped flowers with yellow lip. 594A—Pkt. 5 cts.

SALVIA (Scarlet Sage) (Bonfire)—A splendid dwarf variety with large erect spikes of rich scarlet flowers; immensely effective; height two feet. 595A—Pkt. 10 cts.

TEN WEEKS STOCKS (Gilliflower)—The Stock is one of the many popular plants, either for bedding or pot culture; for brilliancy and diversity of color, or profusion and duration of bloom, it is unsurpassed. Of delightful fragrance. For early flowering, start the seed in a greenhouse or hotbed, and transplant into the garden in May, after all danger of frost is over. Half-hardy annual. 598A—Pkt. 5 cts.

FOUR O'CLOCKS—Handsome border plants, with rich, glossy leaves, profusion of bloom, divers colors and foliage. The flowers open in the afternoon, hence the name "Four O'Clock." Hardy annual. All colors mixed. 540A—Pkt. 5 cts.

GAILLARDIA (Blanket Flower)—Very showy annual of easy culture. Blooms from early spring until frost. Flowers on long stems in orange, brown, bronze, maroon and crimson. Mixed varieties, including Lorenziana double type. 541A—Pkt. 5 cts.



Hollyhock (Double). 533A



Cypress Vine. 527A

Spencer Sweet Peas

Separate Colors

12 Varieties

K-H GIANT ORCHID MIXTURE—Unsurpassed for beauty of flowers. Strong plants and enormous flowers, long stems, indescribable array of colors, shades and markings. The grandest mixture ever offered. Large home garden size packet. 600A—Pkt. 10 cts.

PRESIDENT—This is without doubt one of the very finest of the Scarlet sweet peas. It is of a glowing self-scarlet color, and a heavy bloomer. The flowers are produced on long stems and retain their beauty a long time after being cut.

603A—Pkt. 10 cts.

K-H JEAN IRELAND—One of the very latest creations; cream colored, edged with pink; without doubt one of the largest and handsomest sweet peas ever introduced. The flowers are borne on long stems, usually in clusters of four blooms, making them exceptionally desirable for cutting.

604A—Pkt. 10 cts.

K-H COUNTESS WHITE—One of the finest and most magnificent White sweet peas ever introduced. The vines are almost completely covered with mammoth flowers. The flowers are borne three to four on a stem and are of splendid substance. It is without a rival among the White sweet peas.

605A—Pkt. 10 cts.

COUNTESS PINK—Of perfect form, remarkable size and exquisite color. The flowers are often two inches in diameter, with both standard and wings charmingly waved and fluted. The coloring is an exquisite soft rose pink, daintily tinted with silvery-white.

606A—Pkt. 10 cts.

ORCHID—One of the finest of the new sorts; the color is a deep rich lavender throughout; standards and wings slightly suffused pink, the true Cattleya color. Plants very vigorous; flowers of exceptional size and a profuse bloomer.

607A—Pkt. 10 cts.

BLANCHE FERRY—This is the very popular old "Painted Lady" pink and white sweet pea in magnificent new form.

608A—Pkt. 10 cts.

ROSABELLE—Undoubtedly the most beautiful and largest of the deep rose-colored selfs. Flowers very crimped or waved, and of extra large size, its color strikingly brightened by a distinct white blaze at the bottom of standard and wings.

609A—Pkt. 10 cts.

K-H ILLUMINATOR—Ground color of salmon-orange with rich bright cerise-pink. Flowers of excellent texture and size. Don't overlook it if you want a splendid novelty in your garden.

610A—Pkt. 10 cts.

NUBIAN—A new maroon, chocolate-colored self of great beauty; large size flower; waved. If you want a wonderful new variety, try the Nubian.

611A—Pkt. 10 cts.



K-H Verbenas. 632A

ASTA OHN—This variety produces large flowers with fluted standard and very large waved wings. Color, a soft lavender suffused with mauve.

612A—Pkt. 10 cts.

Sweet Pea Collection

Complete collection of 12 distinct varieties, an unusual opportunity to get the best and choicest sweet peas at a reasonable price.

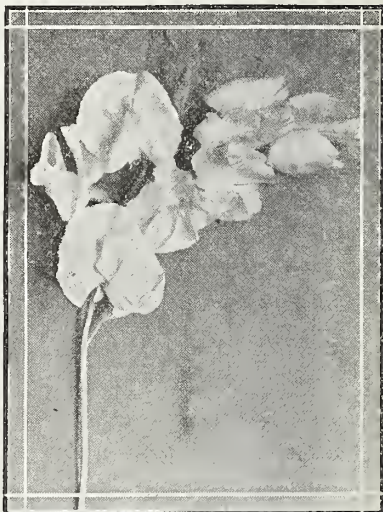
615A—Collection, 12 pkts, \$1.00.

Sweet Peas inoculated with NITRAGIN before planting will always grow into stronger and healthier plants. Inoculated Sweet Peas gather the nitrogen from the air and convey it down to the roots. The young plants are thus made strong and thrifty. Good healthy inoculated Sweet Peas develop longer stems, larger blooms, and intensified colorings. Inoculation is the secret of successful Sweet Pea growing. NITRAGIN is sold in 30c cans. See page 37.

Common chimney soot mixed with the soil where sweet Peas are planted will intensify the color of the bloom. This is a proven fact.



Rosabelle Sweet Pea. 609A.



Dobbie's Cream Sweet Pea. 602A.

Countess White Sweet Pea. 605A

K-H FIERY CROSS—Fiery Cross has all the appearance of live fire, the color being a scorching fire-red or scarlet, without any shading, and which scintillates and glitters in bright sunlight, thus adding a glowing, fire-like sheen which radiates over the flower. Unlike most of the orange-scarlet varieties, it does not scorch nor burn even during extended periods of intense sunshine; therefore it can be grown in all soils without shading. The beautifully waved and fluted flowers are borne freely in threes and fours, well placed on long stout stems.

601A—Pkt. 10 cts.

DOBBIE'S CREAM—We consider this one of the best Primrose Spencers yet introduced. A strong-growing, profuse-blooming variety, with large, much-waved flowers, often duplexed and with many four-blossomed sprays.

602A—Pkt. 10 cts.

Sweet Williams; K-H Verbenas; K-H Zinnias

SWEET WILLIAM: SINGLE AND DOUBLE MIXED—Extensively used in old-fashioned gardens; flowers borne in large clusters of most brilliant colors, and are fine for cutting. An indispensable plant for perennial beds and borders. Seeds, if sown in February and March, usually flower the same summer.

625A—Pkt. 5 cts.

VERBENAS: K-H MAMMOTH MIXED—This distinct and beautiful race is worth a place in every garden. The average trusses measure 6 to 8 inches in circumference and the individual florets on properly grown plants measure over one inch across. They bloom freely, are vigorous in growth and contain beautiful new colors and shades. For garden beds and massing these Verbenas are unrivaled; flowers of the most brilliant colors produced continually from spring until late in the autumn. These form luxuriant plants and bloom the first season from seed.

632A—Pkt. 10 cts.

ZINNIA: K-H MAMMOTH FLOWERING MIXED—The Zinnia is prized for its brilliant colors, for the size and perfection of its flowers, for its sturdy growth, and for the associations connected with it as an old-time favorite. Seed sown in the open ground will produce strong plants which will thrive and bloom from early summer until killed by late frosts. Set plants from 12 to 18 inches apart. If the plants are crowded, the flowers will be small and imperfect. The young plants can be easily transplanted.

635A—Pkt. 5 cts.



Sweet Williams. 625A.

Gladioli from the Gardens of Smedley

The Gladioli offered on this page were grown especially for us by T. D. Smedley, owner and operator of The Gardens of Smedley. Mr. Smedley is an experienced grower and an authority on the subject of Gladioli; hence, our customers may be assured that our offerings are of the best and most popular standard types—all true to name.

EXHIBITION MIXED—Our Exhibition Mixture of Gladioli cannot be surpassed for beauty. You will find in this mixture all your old favorites and many of the newest types; the bulbs are large and can be depended upon to produce good, strong spikes of bloom. The Gladiolus has become a prime favorite with everyone. Is there anything prettier than a bed of beautiful Gladioli?

700A—6 for 20 cts.; 12 for 35 cts.; 100 for \$2.25.

MRS. FRANCIS KING—A new variety which excites great comment and admiration, both for size of flower and beauty; the color of the flower is a light scarlet; the flowers are very large, usually measuring from 3 to 4 inches in diameter.

701A—Each 5 cts.; 6 for 25 cts.; 12 for 45 cts.

CHICAGO WHITE—The flowers are well expanded, well placed upon the stalk; pure white with faint lavender streaks in the lower petals. The earliest and best white for quick forcing and early bloom in the open ground.

702A—Each 5 cts.; 6 for 25 cts.; 12 for 45 cts.

EUROPA—The finest pure white Gladiolus. This new variety is of perfect form, produced on strong, stiff, tall spikes, usually bearing from 20 to 25 pure white blooms. The flowers open very rapidly and it is not uncommon to have from ten to twelve of these open at the same time; the formation is very close and compact, making a perfect spike from the time when the first bud opens until the last.

703A—Each 12 cts.; 6 for 65 cts.; 12 for \$1.25.

PANAMA—A new seedling of America which resembles the parent in every way except that it is a much deeper pink. A grand variety which evokes words of praise wherever exhibited. Spike very long with flowers large and well arranged. Many awards.

704A—Each 7 cts.; 6 for 40 cts.; 12 for 75 cts.

EMPERESS OF INDIA—Rich, deep crimson red, velvety texture, very choice and an erect grower.

705A—Each 10 cts.; 6 for 55 cts.; 12 for \$1.00.

GOLDEN KING—Golden King resembles its parent, Golden Queen; but is much larger in flower and habit of growth. The color is a bright glistening yellow, with a crimson blotch in the throat. This variety produces a large spike, and from 21 to 24 flowers on a plant are common. This variety was awarded the highest honors by the National Gladioli Society of England.

707A—Each 10 cts.; 6 for 55 cts.; 12 for \$1.00.

MYRTLE (Arbutus Pink)—Cream and pink; purple stamens; very handsome. Admired for its graceful spray. Awarded silver medal by the Massachusetts Horticultural Society.

708A—Each 12 cts.; 6 for 65 cts.; 12 for \$1.25.

INDEPENDENCE—All things considered, the best light red in the market under name. Strong, upright grower, clean foliage, large cherry flower in perfect shape, marked white and maroon in throat, and on good spike. Stem always straight. Fine by artificial light.

710A—Each 5 cts.; 6 for 25 cts.; 12 for 45 cts.

MRS. FRANK PENDLETON—A magnificent variety, which has won various awards on account of its practicability for cutting, as

well as for its beauty. Every bud opens up in water fully and perfectly. Flowers are very large and well expanded, of a lovely flushed salmon-pink, with blood-red blotches in the throat.

711A—Each 10 cts.; 6 for 55 cts.; 12 for \$1.00.

NIAGARA—Of American character, but somewhat larger; rich cream color deepening to canary-yellow on lower petals. A faint carmine blush at tips of petals and streak at throat, with purple stamens and carmine stigmas, make a combination of exquisite beauty and attractiveness.

712A—Each 10 cts.; 6 for 55 cts.; 12 for \$1.00.

PEACE—Wonderful white Gladiolus. Gigantic flowers are borne on a magnificent tall spike; the entire plant shows a vigorous, healthy constitution. The wide open flowers are of a glistening white, with an attractive narrow stripe of purplish-carmine through the center of each lower petal. This extra throat marking is not a detriment to its beauty, but adds to its attractiveness. The noblest white Gladiolus.

713A—Each 10 cts.; 6 for 55 cts.; 12 for \$1.25.

PINK PERFECTION—Very large bloom of fine form, long spikes of beautiful shade of apple-blossom pink, similar in color to Carnation Enchantress.

714A—Each 12 cts.; 6 for 65 cts.; 12 for \$1.25.

SCHWABEN—Yellow Gladiolus. The flowers of this striking new Gladiolus are of a pure canary-yellow, shaded to a soft sulphur-yellow when opening; the golden-yellow center is blotched with a brilliant brownish-carmine. Flowers open six to eight at one time. About 20 finely-formed flowers are produced on extremely strong stalks. The foliage is large and vigorous, of a beautiful dark green, which combined with the brilliant sulphur-colored flowers, makes it very effective for groups of beds.

715A—Each 10 cts.; 6 for 55 cts.; 12 for \$1.00.

WAR—A giant red Gladiolus. Undoubtedly the largest of all Gladioli, showing from 4 to 6 open flowers at one time. Color a deep blood red, shading to crimson.

716A—Each 10 cts.; 6 for 55 cts.; 12 for \$1.00.

AMERICA—Without an exception America is the most beautiful and useful Gladiolus yet introduced. Strong and healthy, with luxuriant dark green foliage. Flower spike, two to three feet long, erect with a great number of large spreading blossoms. Color exquisite soft lavender-pink, the same as seen in the most beautiful Cattleya Orchids. No color like it in any other Gladiolus.

718A—Each 5 cts.; 6 for 25 cts.; 12 for 45 cts.

GLADIOLUS AS A CUT FLOWER

As a cut flower the Gladiolus is more accommodating to circumstances than are most others. If required at an earlier date than that on which the flowers would naturally open, they may be cut and the stems inserted in water, and placed in a warm temperature, to which response is speedily manifest; or, if too early, they may be retarded, and will keep fresh for several days in a cool room or cellar. For conveying distances, they are unsurpassable for the length of time they will remain without moisture in a close-fitting box uninjured, and when placed in water on arrival at their destination, they quickly revive, and the unopened blooms commence to expand nearly as well as though they had roots and corm beneath them.



War. 716A



Mrs. Frances King. 701A



America. 718A



Spirea Van Houtte. Commonly Known as Bridal Wreath

Ornamental and Flowering Shrubs

Before planting shrubs, there must be a thorough preparation of the soil to do justice to the plants. In the poor and poorly prepared soil they may live on indefinitely, but they will never give much satisfaction.

Spade up the place in which you propose to set them to a depth of at least eighteen inches. Bear in mind the fact that their roots go deep down into the soil when the soil is mellow enough; also that the roots that go deepest are those from which the plant gets most of its nutriment and upon which it draws moisture in a dry season.

Few soils are rich enough in their natural condition to answer the requirements of most shrubs. Therefore, add to the soil that you turn up at the time of spading, a certain amount of stable manure; or, lacking this, bone meal.

In setting out shrubs, be sure to have the hole in which you plant them wide enough to admit of spreading out their roots as naturally as possible. Never cramp or twist the roots into unnatural shapes, or cut them off, as some people do to make them fit the hole. Better to make the hole fit the roots.

Do not expose roots of plants to the air any longer than necessary when planting.

Cover roots of plants, which are not to be set out immediately, with wet burlap. It is very important to keep the roots damp.

When you have the plant in its place, sift fine soil over the roots and work it in among the roots by lifting the plant a little and shaking it so the soil will settle down among the fine roots. Settle the soil firmly by applying water before filling the hole. Then draw in the soil that was thrown out of the hole, tramping it down well as you go along.

Go over the shrubs before putting them in the ground, cutting away all weak branches. Examine the roots carefully, and if you find any roots have been mutilated since being dug at the nursery, cut away the bruised portions.

Before setting, look at the shrub and try to set it at the same depth at which it was planted in the nursery.

Many shrubs are shipped out without being pruned. It is a good plan to shorten all branches about one-third. Some of the roots have been sacrificed when taken out of the ground at the nursery; for this reason the tops should be cut away. We would advise shortening all the roots and branches.

The new growth will be found more satisfactory than the old, though the effect may not be so immediate. This, however, will make little difference. In consideration of their welfare, we can well afford to prune them sharply, knowing that spring will hide the wounds we make at planting time.

For this northern territory, we recommend early spring planting of shrubs and trees.

PINK TARTARIAN HONEYSUCKLE—This beautiful shrub is perfectly hardy, grows to a height of 8 to 10 feet. Here in Northern Iowa it is covered with beautiful pink flowers by Decoration Day, which contrast beautifully with its bright green foliage, but its chief claim is its wealth of orange-like red berries, which literally cover the plant in summer and autumn, making a most glorious show. Price (by express) 1 to 2 ft., well-rooted plants, 50¢ each; 10 for \$3.50.

HYDRANGEA PANICULATA GRANDIFLORA—These plants are absolutely hardy, grow in any soil and bloom the same year they are set out. They flower abundantly, bearing hundreds of immense panicles of bloom. White, turning to rose-color in autumn. An annual shortening of the branches tends to increase the size of the flowers. Very fine and valuable for cemetery planting. Price (by express) 50¢ each; 10 for \$4.00.

LILAC—The lilac appears to best advantage when massed in groups, and only a few varieties of but one or two colors. You may make any number of groups of the different colors; they are easily transplanted in either fall or spring. Moderately rich, moist soil suits them best.

LILAC: PURPLE—The familiar species of all fine old gardens, with dense panicles of lilac flowers; still the most fragrant of any. Price (by express) \$1.00 each; 10 for \$6.00.

LILAC: WHITE—Pure white, very fragrant flowers. Price (by express) \$1.00 each; 10 for \$6.00.

COMMON SNOWBALL (*Viburnum Opulus Sterile*)

—A hardy shrub, with handsome, showy flowers that appear in numerous compact balls in the spring. An old time favorite, and without doubt one of the best of the flowering shrubs. As specimen plants the Snowball has few rivals, and for grouping and massing make possible many charming effects.

Price (by express) 50¢ each; 10 for \$4.00.

SYRINGA OR MOCK ORANGE (*Philadelphus*)—

A tall, vigorous and hardy bush. In May it bears profuse white flowers resembling orange blossoms. These shrubs are very valuable for backgrounds, screens, grouping or specimen plants. The beautiful white flowers are fine for cutting, and are also deliciously fragrant. They not only make a grand display at the flowering period, but they continue to please with their attractive foliage.

Price (by express) 50¢ each; 10 for \$4.00.

SPIREA VAN HOUTTE (*Bridal Wreath*)—Graceful with long, drooping sprays, thickly studded with handsome, pure white flowers; hence its popular name of "Bridal Wreath." This is



White Pine



Norway Spruce

Ornamental and Flowering Shrubs (Continued)



An Ideal Windbreak of White Pine

the finest and probably the most beautiful of the Spireas. In May and June the arching branches are covered with little white flowers. The foliage is very beautiful, having dark green leaves, incisive borders, pale, bluish-green beneath, and persisting until late autumn. The shrub grows to six feet, is hardy and much planted for borders and single specimens. Perfectly hardy, vigorous grower and fine for a fancy hedge and as a screen.

Price (by express) 1 to 2 ft., well rooted plants, 50c each; 10 for \$4.00.

SNOWBERRY (Racemosus)—Inconspicuous, rose-colored flowers. In June and July, followed by large, clustered, milk-white fruits, which remain far into winter. The combination of pink flowers and white berries on the same twig is charming. Compact in form, with numerous slender, twiggy branches.

Price (by express) 2 to 3 ft., 50c each; 10 for \$4.00.

TREE HYDRANGEA—The same as *Hydrangea paniculata grandiflora*, but grown on stems three to five feet high. Most attractive and desirable, making a desirable specimen for the lawn and especially beautiful when covered with the immense panicles of bloom.

Price (by express) \$1.25 each; 10 for \$10.00.

Hardy Shade and Ornamental Trees

CAROLINA POPLAR—Takes front rank among the best of Poplars; it is one of the most rapid growers among shade trees. Its branches spread just enough to give it a symmetrical appearance. It has advantages over other shade trees because it will grow on any kind of soil, swampy or muck, light or heavy. Its roots penetrate the hardest soil, it withstands all hardships and thrives in times where others fail to live.

Prices (by express) 5 to 6 ft., transplanted, 50c each; 10 for \$4.00; 6 to 8 ft., transplanted, 60c each; 10 for \$5.00.

EUROPEAN MOUNTAIN ASH—A very pretty tree with abundant clusters of large orange berries in autumn. It is known and highly esteemed as one of the most beautiful trees that grow. A vigorous grower, and will add much to the beauty of your home.

Price (by express) 6 to 8 ft., transplanted, \$1.00 each; 10 for \$8.00.

ELM—The noble, spreading, drooping tree of our woods. One of the grandest park or shade trees. A magnificent, stately tree, easily distinguished by its wide, weeping top and pendulous branchlets. One of the most noble and graceful trees where a tall, spreading tree is desired.

Prices (by express)—6 to 7 ft., transplanted, 75c each; 10 for \$5.00; 8 to 10 ft., transplanted, \$1.00 each; 10 for \$7.00; 10 to 12 ft., transplanted, \$1.50 each; 10 for \$12.00.

WISCONSIN WEEPING WILLOW—A beautiful tree with straggling, weeping branches. Makes a fine tree for the lawn or background.

Prices (by express)—6 to 7 ft., 75c each; 10 for \$5.00; 8 to 10 ft., \$1.00 each; 10 for \$6.00.

Hedges

THUNBERG'S BARBERRY (Deciduous)—A beautiful plant with drooping branches, spoon-shaped leaves, foliage is a brilliant green in summer with branches of a lighter shade. From early autumn until early winter the leaves are of a rich crimson and the branches are loaded with scarlet berries. Even in winter it is very attractive, as the berries stay on and the closely interwoven branches are thickly set with spines and never grow bare. We cannot recommend this hardy Barberry too highly for hedge planting. Barberry should be planted 18 inches apart and should not be trimmed.

Price (by express)—18 to 24-inch, 75c each; 10 for \$6.00; 100 for \$50.00.

AMERICAN ARBOR VITAE (White Cedar)—The American Arbor Vitae is perfectly hardy, easy to transplant, and bears shearing better than any other variety. Compact in

appearance, dark green in color, with beautiful fern-like branches. They should be planted 18 inches apart for a good hedge.

Price (by express)—18 to 24-inch, once transplanted and root pruned: 60c each; 10 for \$5.00; 100 for \$45.00.

WESTERN WHITE SPRUCE—The White Spruce is a native of North America, and is by far the best Spruce there is for planting west of the Mississippi River. The time will come at no distant date when the prairies of Nebraska, Montana, Iowa and the Dakotas will be well protected by White Spruce windbreaks. At the present time there are many of these windbreaks in these states that are succeeding far beyond expectations. It is a rapid grower, compact and upright and of great longevity.

Price (by express)—Twice transplanted and twice root-pruned: 12 to 18 inches, 75c each; 10 for \$7.00; 18 to 24 inches, 80c each; 10 for \$7.50.

Evergreens

NORWAY SPRUCE—Of all the large list of varieties of this class of conifers, the Norway Spruce is perhaps the most popular, best known and most widely planted. It makes a large fine looking tree, is the most rapid grower, thrives in a great variety of soils, is hardy everywhere and stands close planting and severe pruning, and for this reason is used more than any other tree for windbreaks and shelter belts. Hedges 25 years old can be trimmed down to a height of six feet; whereas the natural growth would be about 50 to 60 feet. It is naturally of a pyramidal, symmetrical growth, branching to the ground. As single specimens or grouped on the lawn they are unapproachable, but especially valuable for windbreaks. Foliage dark green; needles short and stiff.

Prices (by express)—Twice transplanted and twice root-pruned: 1½ to 2 feet, 50c each; 10 for \$4.00; 100 for \$35.50; 3 to 4 feet, \$1.00 each; 10 for \$8.00; 100 for \$75.00; 4 to 5 feet, \$1.10 each; 10 for \$8.50; 100 for \$80.00.

WHITE PINE—The White Pine, which grows a little faster than the Spruce, is by far the best all around evergreen of the pine family for planting in states east of the Missouri River, but we do not recommend or sell White Pine for planting west of the Missouri. It is a native of Minnesota, Wisconsin and Northern Iowa. On account of its rapid growth and ease in transplanting, it has become the most popular tree for shelter belts and windbreaks. It grows thick and compact, is thoroughly hardy, stands extreme heat or cold, and will always be one of the most popular evergreens for windbreaks or ornamental planting. Foliage light green; needles long and soft.

Prices (by express)—Twice transplanted and twice root-pruned: 1½ to 2 feet, each 50c; 10 for \$4.00; 100 for \$37.50; 2 to 3 feet, each 75c; 10 for \$6.00; 100 for \$50.00; 3 to 4 feet, each \$1.00; 10 for \$8.00; 100 for \$75.00; 4 to 5 feet, each \$1.10; 10 for \$8.50; 100 for \$80.00.

SCOTCH PINE—The Scotch Pine is a rapid grower, thrives well on poor soil, and is well adapted for western states. It is easily handled, grows a little faster than the White Pine. It is one of the best all around evergreens to withstand extreme exposure and rough usage. Our experience has been that it will stand more trampling by livestock, when planted in and around feed lots and farm yards, than any of the more ornamental evergreens.

Prices (by express)—Twice transplanted and twice root-pruned: 1½ to 2 feet, each 50c; 10 for \$4.00; 100 for \$37.50; 2 to 3 feet, each 75c; 10 for \$6.00; 100 for \$50; 3 to 4 feet, each \$1.00; 10 for \$8.00; 100 for \$75.00; 4 to 5 feet, each \$1.10; 10 for \$8.50; 100 for \$80.00.

JACK PINE—The Jack Pine, which is often called the Yellow Pine, is the most rapid grower of all the evergreens. In fact, it will make a windbreak as quickly as a willow. It does fine in Iowa and Nebraska. It is not a beautiful tree when planted alone, but it does make a good, quick, rough windbreak, and is very easy to transplant.

Prices (by express)—Twice transplanted and twice root-pruned: 1½ to 2 feet, each 50c; 10 for \$4.00; 100 for \$37.50; 2 to 3 feet, each



Small Norway Spruce and Tall Scotch Pines

Ornamental and Flowering Shrubs (Continued)

75c; 10 for \$6.00; 100 for \$50.00; 3 to 4 feet, each \$1.00; 10 for \$8.00; 100 for \$75.00; 4 to 5 feet, each \$1.10; 10 for \$8.50; 100 for \$80.00.

DWARF MUGHO PINE—You all know the pretty little Dwarf Pine that forms such a bushy, compact little tree. This Pine is always very popular, because it can be put to such a variety of uses, always does well, and never looks out of place. The Dwarf Pine grows as broad as it does tall, and can be planted anywhere upon the lawn, as it takes up so little space. Foliage dark, with long, stiff needles. You are sure to be pleased with this pretty little tree.

Prices (by express)—Three times transplanted and three times root-pruned: 12-inch, each \$1.50; 10 for \$12.00; 15- to 18-inch, each \$2.00; 10 for \$15.00.

BLACK HILL SPRUCE—The Black Hill Spruce is a form of the White Spruce, a native of the Black Hill country of South Dakota. It resembles its parent, the White Spruce, very much, but is a much slower grower and a little more compact. Under favorable conditions it rivals the Blue Spruce in color.

Prices (by express)—Twice transplanted and twice root-pruned: 12 to 18 inches, each 60c; 10 for \$5.00; 100 for \$40.00; 18 to 24 inches, each 75c; 10 for \$6.00; 100 for \$50.00.

COLORADO BLUE SPRUCE (Shriners)

—There are trees of every imaginable form and color, but here is the height of nature's ambition to produce the beautiful. Picture if you can a perfectly shaped tree, with a quantity of heavy foliage, of a rich, silvery glistening blue which flashes and sparkles in the sunlight, and you will have only a faint idea of the magnificent beauty of this marvelous tree. The Colorado Spruce glories in its foliage, which is of a steel-blue. It is indeed a triumph in evergreen growing and has created much sensation throughout the United States and Europe because of its beauty.

Prices (by express)—Three times transplanted and root-pruned: 12 to 18 inches, each \$3.00; 10 for \$20.00; 18 to 24 inches, each \$3.50; 10 for \$23.00; 24 to 36 inches, each \$4.00; 10 for \$29.50.



Ornamental Shrubs

WHAT YOUR GARDEN DOES

Growing a garden—coming in contact with soil and working in the open air—develops the best characteristics of boys and girls and of men and women.

One learns to love to watch the seeds unfold, the plants grow and blossom, and to gather the crops.

Care of a garden develops a sense of ownership and a respect for the property of others.

Fighting the drouth, the weeds, and injurious bugs and insects develops power and character.

When Daniel Webster was asked, "What do you raise on the rocky soils of New England?" he answered, "We raise men."

We can say the same thing of gardens. They raise men—and women, too—for working in the garden develops physical health, mental power, and moral strength.

HOTBEDS

How to Make and Keep Them

The value of the hotbed is being appreciated more than ever. Quite a batch of inquiries come in daily, requesting information regarding their construction and maintenance. It a good sign. It shows that more and more people are becoming interested in progressive methods of gardening. The hotbed is an essential part of a progressive gardener's outfit. Without it he cannot reach the high degree of productivity which is so very necessary at this time. The hotbed is simple of construction and inexpensive. It is also a source of much healthful exercise. As a brain soother for busy business men it stands almost without an equal. While an incubator will often drive a man to desperation, a hotbed has the directly opposite effect. The preparation of the hotbed, the seeding, caring for the young plants—all these things are stimulating and help us to forget our little everyday worries.

Every vacant lot owner and home gardener should have an interest

in a hotbed. It is not necessary, of course, that all should possess a hotbed. One good hotbed will produce sufficient early plants for five or six lots. Why not arrange for a community hotbed? This plan has been a great success in Europe; why not right here? It is generally supposed that only such plants as early cabbage, cauliflower, peppers, egg plants and tomatoes can be successfully raised in a hotbed. This, however, is a mistake. Gardeners of Waterloo and vicinity will find the hot bed valuable for starting giant onions of the Prizetaker, Ailsa-braig and Gibraltar types. If started in hotbeds, these mammoth onions can be depended upon to mature in our latitude, notwithstanding our short seasons. We have experienced considerable difficulty during the past few seasons, in getting watermelons and muskmelons to ripen. Frost has come all too early and cut them off just as we were full of delightful anticipations. Try planting a few paper pots of watermelons and muskmelons in the hotbed, and transplant them without disturbing the roots. Your reward will be a good supply of well ripened fruits weeks earlier than when seed is sown outdoors in the usual way. If you are unable to get paper pots, use the old style flower pots. When transferring watermelon or muskmelon plants, be sure to water thoroughly, so that they can be removed without disturbing the roots. Also, water the plants well after they are placed into their permanent positions. If the weather should be unusually hot and sunny at the time of transplanting, it would help the plants to protect them from the rays of the sun for a few days with a covering of paper or old burlap. A hotbed should, if possible, have protection against the north and northwest winds, and should be located on ground that slopes gently to the south. It is also a good plan to have it within easy reach so that it will receive proper attention.

Hotbeds are usually built six feet wide and some multiple of three feet in length, so that the ordinary hotbed sash which costs about \$2.00 each may be used to cover them. A 6x12 ft. bed should produce all the plants needed for an ordinary kitchen garden. The walls of the frame may be made of concrete, brick or plank. The latter is most commonly used as most hotbeds are intended for temporary use only.

To make a hotbed of this kind, build a substantial frame six feet wide and 12 feet long, or 2 in. plank. It should be 14 inches high at the back and 10 inches high in front, with the ends conforming to the slope. A 2x4 in. crosspiece should be set into the frame, flush with the top every three feet so that it acts as a brace and helps to support the sashes. Dig a pit two feet deep, eight feet wide and 14 feet long, with the length running east and west. After the bed has been properly manured the frame may be set in place.

The best manure for hotbeds is from grain-fed horses. It should contain about one-third of its bulk of straw. Handle the manure carefully so as to prevent excessive decomposition. A week or so before filling the bed, the manure should be hauled to it and piled in a flat, compact heap about three feet high, near the hotbed. If the weather is very cold, several buckets of hot water may be added to start the manure heating. In a very few days, the pile will be well heated through. Then turn the pile inside out, putting the outside or coldest manure inside the heap. When the pile has again heated, get busy and fill your pit, putting in about six inches of manure at a time, and tramping it down thoroughly around the edges. A little warm water may be added if the manure is not moist enough. Fill in the manure so that it will come about four inches from the top of the frame. The sashes should now be put on and the pit left until the manure has thoroughly warmed up: then the soil may be put in. The heating period of a hotbed is about ten weeks. After this time it may be used as a cold frame. Any good garden soil may be used for hotbeds. It should be well pulverized and packed. Don't sow seed immediately; wait until the bed is the right temperature, 85 or 90 degrees. Plant seed in rows about three or four inches apart. When plants show signs of crowding, thin them out. Water the plants in the morning when there is sunlight. Afternoon watering lowers the temperature at a most critical time, and should never be done.

Give the hotbed sufficient ventilation. In very cold weather it may be necessary to raise the sashes and lower them almost immediately. During warm days, they may be left raised during the warmest hours. Hot, moist air will encourage damping off, the worst of hotbed diseases. One must be careful to avoid this by giving sufficient ventilation. During exceptionally cold weather the hotbed should be covered at night with paper, burlap, matting or straw.

Where it is impossible to dig pits on account of the frozen ground, surface hotbeds can be constructed by packing the manure on the surface and placing frame on top.

STRAWBERRY PLANTS (Iowa Grown)

Strawberries can be grown with success in any well-drained garden soil. There is always a good market for them, they rank first among small fruits as they are so well adapted for culinary purposes—table use, canning or preserving.

Strawberries are acid tolerant plants therefore do well on soil inclined to be sour or acid.

SENATOR DUNLAP

Known as Dunlap, also Senator. One of the best-known strawberries. Strong, healthy growers, and easily handled by either expert or beginner. The berries are medium to large in size, of a deep, rich, red color and have excellent qualities. If part of the plants are thinned out, the yield in quality of berries will be greatly improved. It is staminate, and will produce perfect fruit when planted alone. Very early. The flavor of the Senator Dunlap is excellent.

Price: 100, postpaid, \$1.50; 500 by express, \$7.25; 1,000 by express, \$14.00. Order for shipment later.

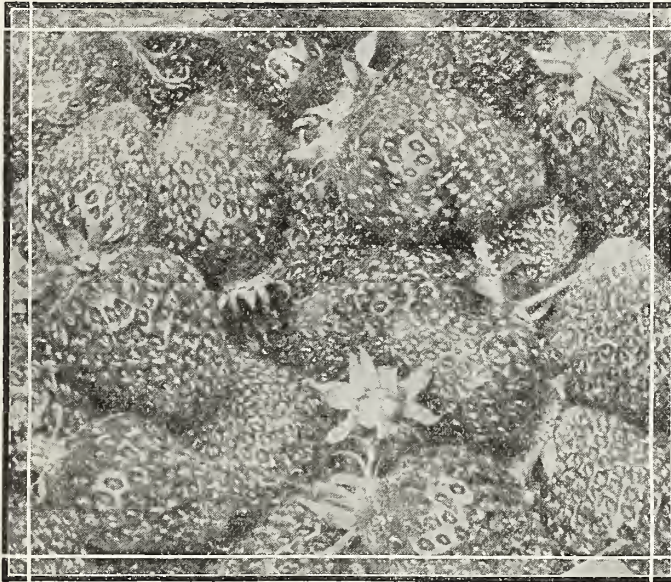
WARFIELD

This is one of the great standard varieties that has been the leader all over the country before the Senator Dunlap was introduced. It resembles the Dunlap, but has a n imperfect blossom. You will make no mistake by planting Warfield and using Senator Dunlap along with them. Warfield Strawberries are good keepers they remain in perfect condition a long time after being picked.

Price: 100, postpaid, \$1.50; 500 by express, \$7.25; 1,000, by express, \$14.00.

GIBSON

A variety which has proven highly satisfactory, therefor in great demand. Fine for home or mar-



Doesn't the Sight of These Make Your Mouth Water?

ket. Heavy producer, excellent shipper as flesh is firm. Fruit is extra large, dark, glossy red. A long-rooted variety, making it drought resistant. Foliage dark green and dense, affording protection to the berries from the hot sun. Long bearing season.

Price: 100, postpaid, \$1.50; 500, by express, \$7.25; 1,000, by express, \$14.50.

PROGRESSIVE EVERBEARING

The best everbearing variety on the market. Strong, healthy and absolutely hardy. Berries

are of highest quality, bright red, and a fine keeper on the vine or in the box. Fruit is medium sized, blossom strongly staminate, and every bloom makes a perfect berry. Bear good crops for over three months in the fall when weather conditions are favorable.

Price: 100, postpaid, \$3.00; 500, by express, \$14.50; 1,000 by express, \$29.00. Include your strawberry order with seed order. Plants shipped later.



Scene in an Iowa Strawberry Field

SUPERB (Everbearing)

Another perfect-blossoming variety. Very large, deep red and glossy; fine flavor. Begins to bear fruit June, and yields immense crop. The plants are strong and healthy, and stand the winter very well. A sort which is sure to please.

Price: 100, postpaid, \$3.00; 500, by express, \$14.50; 1,000 by express, \$29.00.

PLEASE NOTE THIS:

STRAWBERRY PLANTS WILL BE SHIPPED AS SOON AS DANGER OF FREEZING IS PAST AND IN AMPLE TIME FOR PLANTING. ORDER NOW FOR SHIPMENT LATER.

Field Seeds

"THE VALLEY OF PROSPERITY" A view on the farm of James Curdie, near La Porte City, Iowa

Field Seeds are so subject to market changes, conditions over which we have no control, that we cannot list prices in this catalog—prices which would have to stand for several months. We will however, issue Special Field Seed Price Lists from time to time as the demands of the market make such action necessary and if you are interested we will gladly put your name in our Special list and will keep you posted on current prices. There is no charge for this service and by keeping in touch with the market in this way you may be able to save a good many dollars during the season. Remember that the

field seeds listed in this department are just exactly what we say they are. If we are cranks on any subject it is on the subject of pure seed. With land at its present price no farmer, either large or small, can afford to waste even a small fraction of his producing acres by sowing inferior or impure seed for the sake of saving a few cents on the original cost. Yet our price for pure seed is no higher than many other seed houses charge for seed of an inferior grade. Write us. Tell us what you want. Get our prices. A square deal is what you want and that is all we ask.

ALFALFA

ALFALFA (Northern Grown)—We have a limited stock of Northern Grown Alfalfa seed, especially suited to the soil and climate of the Northern States; strictly pure and of the highest vitality.

SOY BEANS

SOY BEANS (Northern Yellow)—This tall branching Soy Bean is just the kind to plant with corn; makes a splendid combination for silage in the North.

BARLEY

BARLEY (Oderbrucker)—Our stock of this well known Barley was especially grown for us; has been re-cleaned, and can be shipped promptly. Iowa grown grain.

BUCKWHEAT

BUCKWHEAT (Japanese)—We have a splendid stock of Japanese Buckwheat especially grown for us. We never saw a finer stock; absolutely pure and Iowa grown.

CANE

CANE (Amber)—Our Amber Cane was grown right here in Northern Iowa. It's a beautiful stock of seed. Ask for sample.

CLOVER

CLOVER (Alsike)—Alsike Clover is very scarce. We have a stock of the highest grade, Northern grown. Alsike Clover is especially suited for low lands, will thrive where other Clovers usually fail. Used in mixture with Timothy for hay.

CLOVER (Medium Red)—We have a fine stock of Northern Iowa grown Medium Red Clover seed; free from weeds, good plump seed that is sure to produce bumper crops of Clover. Maintain your soil fertility by seeding down Medium Red Clover.

CLOVER (White)—This little Clover is much used for the improvement of lawns. It is highly valuable as a pasture when mixed with grass. It has a very high feeding value. See page 24.

GRASS

GRASS (Kentucky Blue)—We fill your orders for this grass with exceptionally pure clean, heavy seed. If your pasture is getting thin, thicken it up by seeding some good Blue grass. Blue grass makes the finest pasture.

MILLET

MILLET (Golden)—Our stock of Millet cannot be excelled. It's

pure, beautifully bright in color, and of the highest germination. Our prices are right.

MILLET (Japanese)—Our Japanese Millet was raised right in the Waterloo district. It is beautiful seed, clean and full of vitality. This Millet is sometimes called Billion Dollar Grass; it's a great hay maker.

TIMOTHY and ALSIKE

TIMOTHY AND ALSIKE MIXED—We have lots of Timothy and Alsike to offer our customers. We bought it direct from Iowa farmers and have thoroughly re-cleaned it. Prices on Timothy and Alsike mixed will get higher as the season advances. Save money by getting your orders in early.

PEAS

PEAS (Canadian Field)—Ask for a sample of our Canadian Field Peas; they are the best we ever saw. They were raised for us up in Wisconsin. Canadian Field Peas are fine for mixing with Oats for hay or green feed.

RAPE

RAPE (Dwarf Essex)—There are two kinds of Rape seed, common and Dwarf Essex. We offer only the Dwarf Essex because it is the only kind farmers should grow for forage. It produces good, strong, robust plants resembling loose-leaf Cabbage. Sow three to five pounds per acre. See page 20.

SUDAN GRASS

SUDAN GRASS: We have a nice stock of Iowa grown Sudan grass seed, clean and high grade. (Refer to page 3 for complete description and full particulars)

TIMOTHY

Timothy—All our Timothy seed was raised around Waterloo; and is the finest that grows. It has been thoroughly re-cleaned by up-to-date machinery in our warehouse. Before placing your Timothy seed order, get our prices; we can save you some money.

OATS

OATS (Iowa 103)—Ask for sample and price of our Black Hawk County grown 103 oats.

OATS (Iowa 105)—We can offer our customers some exceptionally fine high-yielding 105 Oats. Ask for sample and price.

For prices see wholesale list enclosed.



FIELD SEEDS (Continued)

The New Schumacher Oat

Does Not Lodge; Is Medium Early; A Record Breaking Yields; Very Large White Grain; Straw Extra Heavy; One Head Produced 278 Kernels; A Great New Oat for 1920

We have purchased the entire stock of Schumacher Oats from Mr. Wm. Schumacher, the originator and grower, because we feel that they are so far ahead of any oats previously put upon the market that they are worth every cent Mr. Schumacher asks for them. Mr. Schumacher has worked for nine long years improving this oat; he has succeeded in breeding it up to the point where he feels he is justified in claiming it to be the best yielding oat in the country; the last three years the Schumacher Oat has out-yielded all other oats one hundred per cent. They are a wonderful oat in every way; the carrying straw is extra heavy, making it almost proof against lodging. Stands 36 to 48 inches high and yields exceptionally well on corn land. A single head of grain carried 278 kernels; one kernel in 1919 crop yielded 2400 kernels. (See illustration on this page). Yields for the past three years averaged 95 bushels per acre. They yielded 85 bushels per acre in 1919 and '19 was a bad year for oats.

Read what "Iowa Farmer" for November 1st, 1919, says about the Schumacher Oat: "J. F. Grawe, the sage of Waverly, 2,400 Kernels From One Kernel Planted Bremer County, tells about a new variety of Oats that a young farmer named W. H. Schumacher, of that section, has developed. It was nine years ago that he started to breed oats, taking two grains, and

these oats to offer so get your order in early. Get a few bushels for a seed plot; double your oats yield; remember these are Northern Iowa Oats, bred here and thoroughly acclimated. Iowa farmers can therefore feel assured of success right from the start. Don't forget the stock of Schumacher Oats is limited. Ask for sample, and ORDER EARLY.

Price, (By express or freight) -
2 bushels (sealed Bag) \$10.00;
5 bushels, \$24.00; 10 bushels, \$46.00.



The Home of the Schumacher Oat

from this he developed an oat that is a marvelous producer. In his picture, he proudly wears two stalks of this marvelous production, the stalk containing a double head, producing a total of 278 kernels. The method by which Mr. Schumacher produced the oats, named "Schumacher Oats," is quite interesting, his cross breeding being the result of securing pollen from Ames and the University of Illinois. For nine years he cross bred his oats, and on the ninth year, he produced a grain that yielded in excess of 100 per cent better than his neighbors. This year, which proved to be a poor season for oats, he secured a yield of eighty-five bushels to the acre, while his neighbors secured yields of thirty to forty bushels."

We have only a limited stock of

The market wants quality oats. Quality depends on weight of the kernel; not on weight of hull. The manufacturer of products from oats and the feeder want the value that is contained in the kernel. Hulls are light in weight and contain little feeding value. In 100 pounds of quality oats, you get as high as 78 pounds of oat meat, while in 100 pounds of poor quality

oats, you get as low as 50 pounds of oat meat. Moreover, in growing poor oats, you cheat yourself. You pay the thrasher by bushel measure, while your grain dealer buys by weight. One hundred pounds of good oats represent about three bushels by measure; one hundred pounds of poor oats, often as high as five bushels. Four bushels of poor oats (machine measure) may weigh no heavier than three bushels of good oats. In growing poor oats, you are paying for threshing and handling hulls for which you get mighty little return.



2,400 Kernels From One Kernel Planted



278 Kernels on 1 Stalk

BRIEFS ON LIME AND LIMING

1. Lime up acid soils to benefit alfalfa and clover.
2. To improve a poor, acid soil, lime it first, then fertilize, and grow clover to plow under.
3. The place for lime is IN the soil, not on top of it.
4. Ground limestone and marl are best to apply to a sandy soil.
5. Lime sand in the spring before seeding to clover or alfalfa.
6. Lime heavier acid soils after they are plowed in the fall, during winter, or in the spring.
7. If much lime is to be used, buy a lime spreader.
8. Use burnt lime with caution.
9. Ground limestone and marl are harmless materials.
10. The coarser the limestone, the more should be applied per acre for quick results.
11. Rarely does lime act as a true fertilizer.
12. Lime cannot inoculate.
13. To grow alfalfa in acid soil, lime first, then inoculate.
14. Lime, ONLY, corrects acidity in soils.
15. Lime is not a "cure all" for every ailment.
16. Buy lime in carload lots.
17. Buy the lime, if finely pulverized, which will give you the most carbonates for your money.
18. Good lime for improving soils should be not less than 80 per cent lime dust, 20 per cent granulated lime.

POTATOES! POTATOES! POTATOES!

All our seed potatoes are grown in the Red River district of Minnesota and North Dakota.

No seed potatoes anywhere can be compared to our Red River Northern grown stock, either for vigor and freedom of disease or for producing and long keeping qualities. The seeds are thoroughly clean, healthy, and free from scab. Unless otherwise advised by our customers, we do not ship seed potatoes until all fear of their being damaged by frost is past. All our seed potatoes are quoted f. o. b. Waterloo.

Extra Early Ohio or Six Weeks

EXTRA EARLY OHIO or SIX WEEKS—The earliest potato grown, and perhaps the best known and most universally appreciated of the whole potato family. They are ready for cooking in six weeks from planting and reach maturity in about eight weeks. As a market variety it is without a rival. They are selected with the utmost care and we are confident our seed will satisfy everyone.

290A—1 bushel, \$3.00; 5 bushels, \$14.00; 10 bushels \$28.00.
Prices are f. o. b. Waterloo and subject to change without Notice.

Early Irish Cobbler

EARLY IRISH COBBLER (Very Popular)—An excellent variety for light soils, producing a larger yield than most varieties when used on light soil. The potato is white and of a medium size.

291A—1 bushel, \$3.00; 5 bushels, \$14.50; 10 bushels \$28.00.
Prices are f. o. b. Waterloo and subject to change without Notice.

Burbank

BURBANK—The most largely used of all late varieties. Is grown to a good size and is of excellent quality. The flesh is white, very mealy and of fine flavor. It is a fine potato for baking. We know of none better for this purpose. A very heavy yielder, and does exceptionally well in heavy soil.

294A—1 bushel, \$3.00; 5 bushels, \$14.50; 10 bushels \$28.00.
Prices are f. o. b. Waterloo and subject to change without Notice.

Extra Early Bovee

EXTRA EARLY BOVEE—It is unquestionably the largest yielding of any of the early potatoes, and in competitive trials has in a great many cases outyielded even the late varieties. This is due to the compact habit of the vines and tubers in growth, which permits of planting six inches closer. Oval shape, pink color and fine even size; smooth shallow eyes. Its fine table qualities are very apparent and greatly appreciated for its richness, dry flouriness and delicious and highly palatable flavor.

292A—1 bushel, \$3.00; 5 bushels, \$14.50; 10 bushels \$28.00.
Prices are f. o. b. Waterloo and subject to change without Notice.

Rural New Yorker

RURAL NEW YORKER—A very distinct and valuable main crop sort. The tubers attain a large size and are of wonderfully smooth skin. The eyes are few, distinct and shallow. It is a very healthy and vigorous variety, as is attested by the growth of vine and solidity of the tubers. A very heavy yielder; under ordinary conditions will yield from 200 to 500 bushels per acre.

293A—1 bushel, \$3.00; 5 bushels, \$14.50; 10 bushels \$28.00.
Prices are f. o. b. Waterloo and subject to change without Notice.

POTATO BLIGHT AND HOW TO KILL IT: Potato Blight may be recognized by dark yellowish-brown spots turning to black, which appear on the leaf of the potato and spread to the stems and finally to the tubers. The attack is in the period of blooming, or a little later. The spots grow in size and spread. The leaves wither, and the stalks become almost bare. If there are many plants at-

POTATOES: Their Requirements: Potatoes can be grown in soil of almost any composition, provided it is well drained. A light or medium sandy soil is best. Potatoes do especially well upon new breaking; when planted in this way they clean the land for succeeding crops. A good fertilizer for potatoes is bone meal.

Small potatoes or potato cuttings weighing not less than 3 oz. and containing at least two eyes are best for planting, as proved by experience.

tacked, the field of potatoes gives off a fetid odor. On the under side of the stricken leaves, and under the blight spots, there collects a whitish fuzz-like deposit; as the spots increase in size, the fuzz collects in a ring around the edges. The attacks of blight are fiercest in damp, foggy weather, when it spreads with lightning-like rapidity from hill to hill, and from field to field. The microscopic blight-producing plant or fungus is destroyed on coming in contact with Bordeaux Mixture.

BORDEAUX MIXTURE AND HOW TO MAKE IT:

This is a standard fungicide and consists of copper sulphate, fresh lime and water. As it is used for the prevention of nearly all fungous diseases, its proper preparation is a matter of considerable importance. The proportions and manner in which the various ingredients are combined so largely affect the resulting mixture that it would be difficult to make indifferently the same mixture twice in succession. The formula in most general use is the following: Copper Sulphate, 4 pounds; fresh lime, 4 pounds; sufficient water to make 50 gallons.

POTATO BUGS—Arsenate of Lead Will Get Them—

How to Prepare It: This is a stomach poison which is rapidly taking the place of Paris Green for such purpose. Its great advantages are that it adheres well to the foliage and hence the spraying does not have to be repeated as it does not readily wash off by rain. It also remains suspended well in water, so that an even distribution can be obtained. It is white in color and shows just where it has been applied; but perhaps its principal advantage lies in the fact that it does not injure tender foliage. It is thus worthy of very general use. It can be prepared by the following formula: Arsenate of Soda, 4 ounces; Acetate of Lead, 11 ounces; Water, 16 gallons. Dissolve each separately in a half gallon of warm water, mix together and add water to make sixteen gallons. The Commercial Arsenate of Lead can be purchased ready for use from the seed stores or any dealer in other insecticides.

PYROX FOR POTATOES—Potato bugs, flea beetles, blight and rot are the most serious enemies of this crop. Your problem is to prevent and destroy these enemies at the least expense. Our answer to this problem is to use a material that increases the yield and value of the crop at the same time that it kills bugs and prevents blight. The way to grow potatoes cheaper is to grow a larger crop. Pyrox will help to do this, because it has a genuine stimulating effect on the foliage, giving the leaves that rich, green color which is so necessary to the practical grower. For nineteen years it has stood the test of practical every-day use by practical every-day men. For Potatoes, use PYROX at the rate of one pound to five gallons of water. Mix thoroughly, keep well stirred and spray the under as well as the upper surface of the leaves. For prices of PYROX, see page 37.



Insures Success with Legumes



For Alfalfa, Clovers, Vetches, Cowpeas, Soybeans, Peas, Beans
Carries No Weeds or Plant Diseases—Enriches the Soil—Stimulates Growth

“Nitragin” Increases Yield—Makes Fertile Soil

Don't Sow Legume Seed Without Inoculation

“Nitragin” is the trade name of the germ that acts in the Legume root; draws nitrogen from the air and converts it into plant food. It insures a uniform “catch,” a strong healthy, hardy plant. At the same time the soil is enriched for the nourishment of the succeeding crop. But remember, only Legumes inoculated with a good reliable culture, such as “Nitragin,” will do this. Use “Nitragin” on all legumes. Make your farm fertile.

Inoculate Seed with “NITRAGIN” Get a Bumper Crop

In order to get a bumper crop your farm must be fertile. Your farm cannot be fertile unless you can grow Legumes successfully, to get a “catch,” to insure an even stand, you must in a great many cases use a good pure culture, such as “Nitragin.” The pure culture system of inoculating legumes is endorsed by the U. S. Dept. of Agriculture, by experiment stations, by agricultural experts, and by farmers who have used “Nitragin.” The leading seed firms through the country are also endorsing pure culture for all legumes. Science has definitely proved that legume crops must find certain bacteria in the soil or they will prove a failure. If you failed to secure a “catch” it's because there is something lacking in the soil. The problem in a great many cases has been solved, that it lacks bacteria sufficient to insure a “catch.”



PRICES

Garden Nitragin (Peas, Beans, Sweet Peas only, all in one can, one size only, weight 4 oz.)	\$.30
Half Acre Size (any culture, weight 4 oz.)	.50
One Acre Size (any culture, weight 8 oz.)	1.00
Two Acre Size (any culture, weight 1 lb.)	1.80
Five Acre Size (any culture, weight 2½ lbs.)	4.00
Ten Acre Size (any culture, weight 5 lbs.)	7.50

“NITRAGIN” bacteria are sold only in the FINELY-GRANULAR MEDIUM and VENTILATED CAN which always assures you strong, active bacteria and uniformly good results.

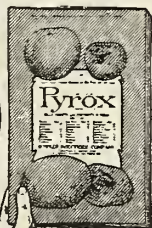
Please state kind of crop you want to use it on, as we have different kinds of “NITRAGIN”

Include “NITRAGIN” with Your Seed Order—Mention Kind of Crop You Want It For



“Never Saw A Bug”

“The potatoes that I sprayed with Pyrox kept green until the frost killed them, without a sign of blight. I never saw a bug on them after using Pyrox. It is easier to apply than any mixture I have ever used, and will not wash off in the heaviest showers.”—L. A. LITTLEFIELD, winner of the first prize of \$200 in a Maine potato growing contest.



Pyrox
REG. U. S. PAT. OFF.
TRADE MARK REGISTERED

“The Spray that Adds to Your Profit”

kills the bugs as fast as they appear, and prevents blight and rot. Use it on the young plants before bugs or blights get their start.

Why not try it? You might like it!

Get this Pyrox Crop Book. It tells how to protect your crops against bugs, worms and disease. Ask for a copy.

See Our Potato Offers on Page 36

What PYROX Means

Pyrox means prize crops of Potatoes, Sweet Potatoes, Tomatoes, Egg Plant, Cabbage and other vegetables. It means sure death to codling moth, canker worm and other chewing insects. It means better peas, peaches, quinces, apples and small fruits. It will not wash off with every shower—it sticks and fights to the last drop. One pound of Pyrox to 5 gallons of water will keep your potatoes free from potato bugs, flea beetles, and blight if you spray in time—therefore do not delay, but get your order in now. These things have been proven by more than eighteen years of actual orchard, field and garden experience.

Pyrox is a smooth, creamy paste which is all ready to use by simply mixing with cold water. It sticks like paint and protects the fruit throughout the growing season. Pyrox is just as good for potatoes, tomatoes, currants, strawberries, etc., as it is for apples or any other fruit.

Include Pyrox with your seed order.

- 1 lb. jar Pyrox (postpaid).....40 cts.
- 5 lb. drum Pyrox (by express).....\$1.75
- 10 lb. drum Pyrox (by express).... 3.00

No matter what you grow or how you spray, you need the PYROX book. It gives full directions how to spray any fruit or vegetables—it teems with suggestions that are worth money to every garden grower. Write for your copy of the Pyrox Book today—it's free.

Simply mix Pyrox with water and your spray is ready for use.

One pound of Pyrox will make five gallons of spraying mixture



FERTILIZERS—Standard and Special

FERTILIZERS FOR GRAIN, FORAGE AND ROOT CROPS—At the time of going to press with our seed catalog, the market on many fertilizers was so unsettled, due to the shortage of potash and phosphates, that we are not able to quote prices at this time on fertilizers for field crops. However, we shall be in line to fill all orders for car lots or less in time for spring top dressing. Ask for prices, stating what you want to use the fertilizer for, Corn, Wheat, Grass or Root Crops; and we will see that you get quotations on the right kind of fertilizer for your needs.

LIME—We are also in position to quote prices in limestone dust for your fields. Write us about this matter and we will advise you prices and nearest point of shipment.

K-H CABBAGE CROWDER—A fertilizer prepared especially for the quick development of Cabbage; insures strong, healthy plants with well formed solid heads.

Price, 5 pounds, 60c; 10 pounds, \$1.00. (Express prepaid.)

K-H SPECIAL GARDEN FERTILIZER—The continued growing and cropping of vegetables on the same piece of ground tends to take out of the soil the plant foods so necessary to the successful raising of good vegetables. Barnyard or stable manure is often difficult to obtain, and it is therefore necessary to give the garden vegetables a few applications of a good, well-balanced commercial fertilizer during the growing season. Vegetables will not give good returns if your soil is in poor condition; plants will grow slowly. Cabbage, Lettuce, Spinach, Kale and other leaf vegetables will be tough and tasteless; Beets, Carrots, Turnips and other root crops will be coarse and woody, making them very undesirable for home table use. All these unsatisfactory conditions can be avoided by the use of K-H SPECIAL GARDEN FERTILIZER; full directions given with every bag.

Price (by express or freight)—100 pounds, \$4.50; 200 pounds, \$8.00.

K-H HOME PLANT FOOD—For Window Boxes, Hanging Baskets and Pot Plants. All plants growing in window boxes, hanging baskets or pots have only limited available supplies of plant food and consequently must be supplied with additional nourishment during the growing season. Unless house plants are supplied during the season with stimulating plant foods, they will certainly decline and perhaps die; on the other hand, plants well nourished with plant food will develop healthy foliage and brilliant blooms. Full directions supplied with every package of fertilizer. Price (by express)—1 lb. package, 50c.

K-H NEWLAWN FERTILIZER—Lawns are continually becoming run out or patchy because there is not sufficient plant food in the soil to keep the young grasses thrifty; or, because the soil does not contain the necessary properly balanced plant food. By the use of K-H NEWLAWN FERTILIZER it is possible to so feed the young growing grasses as to insure a good, strong, thrifty growth. This fertilizer is high in phosphate, the element of plant food so desirable to the healthy production of grasses everywhere. A lawn can be kept in a high state of healthy productiveness by an occasional top dressing of K-H NEWLAWN FERTILIZER.

Price (by express or freight)—100 pounds, \$4.00; 200 pounds, \$7.50.

K-H TOMATO TONIC—A splendid fertilizer for Tomato plants; puts health into the plants, helping them to throw off many of the diseases which attack the Tomato plants; sets the bloom firmly; insures an abundant crop of well-shaped, richly-colored fruit, and early ripening.

Price (by express) 1 pound, 50c; 5 pounds, \$2.00.

100 lbs. of fertilizer per acre equals 1 lb. for a plot 10x42 ft.; 200 lbs. per acre equals 1 lb. for a plot 10x21 ft.; 300 lbs. per acre equals 1 lb. for a plot 10x14 ft.; 400 lbs. per acre equals 1 lb. for a plot 10x11 ft.; 500 lbs. per acre equals 1 lb. for a plot 10x9 ft.



The CYCLONE Seed Sower

A VERY POPULAR HAND SOWER AND VERY EXTENSIVELY SOLD—This is a great labor and seed saver. The working principle is a marvel of simplicity in construction and perfect in operation; even a boy can work it. It will sow all kinds of small grains or seeds evenly and any desired amount per acre, and from 30 to 60 acres per day. Instructions with every machine.

The manufacturer has had more than thirty years experience making these Sowers and guarantees every machine to do satisfactory work. We make our price so low in order to give every farmer who reads our Catalog an opportunity to procure one of these most valuable Seed Sowers. Buy one for your spring Seeding and it will last you a life-time and you will be pleased.

Price (by express, f. o. b. Waterloo), \$2.00 each.

The FEENY DUST GUN



A perfect hand-dusting outfit for the quick, easy and effective application of powdered insecticides and fungicides. It is mechanically perfect, durable, is easily operated and never fails to give absolute satisfaction.

The FEENY DUST GUN is made of the best materials obtainable. It will last a lifetime, always giving perfect service. Its construction virtually eliminates mechanical friction, the packing being accomplished by the air movement. It is double acting and at each movement of the piston automatically measures and ejects a sufficient amount of dust for that one air pulsation. It is very light in weight and easily held in the hands in the most natural position.

No complicated mechanism — just fill the hopper and begin. A child can operate it with ease.

It emits powder in clouds of right consistency from any position and in any direction, downward, upward, or horizontal.

Use it in your garden, greenhouse, poultry house. Use it for flies, roaches and other pests.

Price, complete (by express, f. o. b. Waterloo), \$3.00 each.



Planet Compressed Air Sprayer

For Spraying Small Trees, Shrubby, Garden Truck, etc.



THE PLANET is a four-gallon capacity sprayer. The handle and locking device are nickel plated. The side seam (the weakest part of any tank) is lock-seamed, grooved and riveted, thereby doubling its strength. The ends are seamed and hand soldered, insuring extra strength. The arrangement for locking the pump in place is the simplest device made for this purpose; a quarter turn of the handle locks the pump air tight and a similar turn in the opposite direction unlocks it. NO CLUMSY PARTS ON TOP OF TANK, everything out of the way and flushed to surface. The nozzle is of the automatic type made to insure quick action when the lever is operated. It has a non-clog spray cap that produces a fine misty spray.

AN IDEAL SPRAY FOR EVERY PURPOSE

SPECIFICATIONS: TANK—7x21 inches. Heads, 20 gauge. Body, 26 gauge Galvanized Steel. Pump—1 3/4 x 1 1/4 inches. Seamless Brass Tubing. HOSE—3/8 inch. Automatic Shut-off Nozzle. All connections 1/4-inch Pipe Thread. Brass or Galvanized Tanks as Ordered.

PLANET SPRAYER complete, Galvanized Iron Tank—(By express f. o. b. Waterloo), \$7.50 each.

PLANET SPRAYER complete, Brass Tank—(By express, f. o. b. Waterloo), \$10.50 each.

GARDITE Guards Gardens



The Gardener's Best Friend--- Gardite

As an effective exterminator of all garden pests, Gardite stands unequalled. It's a reliable weapon of defense for the gardener everywhere. Gardite is the bugs' worst enemy. The home garden or market garden can be kept in good healthy clean condition by an occasional application of Gardite.

Why be worried every season with Cabbage Worm, Asparagus Beetle, Cucumber Beetle, Aphid, Flea Beetles, Caterpillars and Potato Bugs, when all these garden pests can be kept away or destroyed by Gardite? Give your garden a chance to be 100 per cent productive; get all the returns possible out of your investment in seed and labor. You can do this by investing in Gardite; it will bring returns in heavy crop yields and much personal gratification.

Use Gardite this season and keep the bugs and worms out of your garden. Gardite stimulates the growth of vegetables and develops flowers into their most beautiful full bloom. Gardite comes in sifter top cans and is easily applied. After a shower or dew, scatter Gardite on the plant, and under it. It will kill the bugs and worms and keep the others away. It is non-poisonous, and will not harm anything but the insect. You need Gardite this year to grow healthier and better vegetables and flowers.

1 lb. can, 35c; 3 lb. can, \$1.00, postpaid.



GERMITE

Good From the
Chick to Hen

Shields your poultry from Roup, Colds, Chicken Cholera, Bowel Complaint, Canker, Chicken Pox, Swelled Head and other diseases. GERMITE is successfully used in the treatment of diseases among chickens as well as a preventive. Use GERMITE regularly. It is guaranteed. It comes in tablet form for convenient mailing.

Price, 75c per pkg., postpaid.



VERMITE

Kills the Lice

Make your poultry lice-free. If they're always kept busy scratching and searching for those tormenting pests, how can they be healthy and productive? Wolf's VERMITE contains "Sodium Fluoride" and other powerful drugs especially recommended by the United States Government, Department of Agriculture, for the extermination of lice, mites and other vermin on poultry, hogs, horses and dogs. Get a handy sifter top can of Wolf's VERMITE today. Your chickens need it. It's economical—dependable—and guaranteed.

Small, 30c, postpaid.
TWO SIZES Large, 50c, postpaid.



SURE EGGS

Makes Hens Lay

Don't you often feel sorry for friend wife when she pays a visit to the hen coop expecting to find enough eggs for a square meal; but, disappointed, returns to the house with two or three instead of a good dozen eggs? You could save your best friend a lot of worry—use SURE EGGS.

Make your hens lay regularly. You can do it with SURE EGGS. Acts as a tonic and tones up their whole system. SURE EGGS contains the right ingredients that every good laying hen needs. Include SURE EGGS in your order and get more eggs.

\$1.00 per pkg., postpaid.

MAR 16 1920

AMERICA—OUR COUNTRY

"I believe that the country which God made is more beautiful than the city which man made; that life out-of-doors and in touch with the earth is the natural life of man. I believe that work is work wherever we find it, but that work with nature is more inspiring than work with the most intricate machinery. I believe that the dignity of labor depends not on what you do, but on how you do it; that opportunity comes to a boy on the farm as often as to a boy in the city; that life is larger and freer and happier on the farm than in the town; that my success depends not upon my location, but upon myself—not upon my dreams, but upon what I actually do; not upon luck, but upon pluck. I believe in working when you work, and in a square deal in every act of life."

Before the opening of the shipping season, we put up great quantities of the collections named below. The varieties cannot be changed from the ones named for the above reason. These contain the very best seeds and are varieties that invariably give the greatest satisfaction; they aid in making the flower garden a success, for the reason that they are all proven kinds. All 1919 crop seed.

For the Home Garden. "AMERICAN" VEGETABLE SEED COLLECTION \$1.00 All 1919 Crop Seeds

1 pkt. Bush Beans, Green Pod	1 pkt. Lettuce, Big Boston	1 pkt. Spinach
1 pkt. Bush Beans, Wax	1 pkt. Muskmelon	1 pkt. Squash, Sweet Potato
1 pkt. Beet, Extra Early	1 pkt. Onion, White Globe	(Winter)
1 pkt. Cabbage, Early	1 pkt. Parsnip	1 pkt. Sweet Corn, Early
1 pkt. Cabbage, Late	1 pkt. Peas, Early	1 pkt. Swiss Chard
1 pkt. Carrot	1 pkt. Peas, Late	1 pkt. Tomato, Extra Early Red
1 pkt. Celery, Golden Self	1 pkt. Pop Corn, Baby Rice	1 pkt. Turnip, Snowball
Blanching	1 pkt. Radish, Long White	1 pkt. Watermelon
1 pkt. Cucumber, Long Green	1 pkt. Radish, Round Red	

ENTIRE COLLECTION OF ABOVE 24 PACKETS, 404A—\$1.00, postpaid.

For the Children's Garden "OLD COLONY" VEGETABLE SEED COLLECTION All 1919 Crop

To
Make
a Real
Garden
for
the
Little
Folks.
Price,
50 Cents,
Postpaid



All
Seeds
Are
New,
Fresh
High
Grade
1919
Crop,
50 Cents
Postpaid

1 pkt. Bush Beans, Wax	1 pkt. Cucumber, Long Green	1 pkt. Radish, Early Round
1 pkt. Beet, Early	1 pkt. Lettuce, Early	1 pkt. Sweet Corn, Early
1 pkt. Cabbage, Early	1 pkt. Onion, White Globe	1 pkt. Tomato, Early Red
1 pkt. Carrot, Early	1 pkt. Peas, Early	1 pkt. Turnip, Snowball

ENTIRE COLLECTION OF ABOVE 12 PACKETS. 405A—50c, postpaid

"FAIRYLAND" FLOWER SEED COLLECTION

20 PACKETS OF BEAUTIFUL, FREE-FLOWERING, EASILY-GROWN ANNUALS

Asters, Choice Mixed	Marigold, African Mixed	Phlox Drummondii Grandiflora, Fine
Alyssum, Sweet	Morning Glory, Choicest Mixed	Mixed
Antirrhinum, Giant Mixed	Mignonette, Large Flowered	Sweet Peas, Giant Spencer Mixed
Bachelor's Button, Mixed	Nasturtium, Finest Mixed Tall	Verbena, Finest Mixed
Balsam, Double Camellia-Flowered	Nasturtium, Finest Mixed Dwarf	Zinnia, Mammoth Flowering Mixed
Mixed	Pansies, Mixed	
Cosmos, Early Flowering Mixed	Poppy, Double Annuals Mixed	For descriptions of flowers offered
Carnation Marguerite, Mixed	Petunia, Finest Mixed	in this collection, see flower seed
Larkspur, Mixed		section of this book.

ENTIRE COLLECTION OF ABOVE 20 PACKETS. 620A—\$1.00 postpaid

Ten Full Packets

"GARLAND" FLOWER SEED COLLECTION

All Choice Seeds

Asters, Choice Mixed	Nasturtium, Choice Mixed Dwarf	Zinnia, Double Mixed
Candytuft, Empress	Pinks, Double China	
Phlox Drummondii Mixed	Pansies, Choice Mixed	For descriptions of flowers offered
Sweet Peas, Giant Spencer Mixed	Poppy, Double Mixed	in this collection, see flower seed
	Petunia, Finest Mixed	section of this book.

ENTIRE COLLECTION OF ABOVE 10 PACKETS, 621A—50c, postpaid.

KIESTER-HALL SEED COMPANY

WATERLOO,

IOWA, U. S. A.

